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## **INTEREST AND SAVING**



# INTEREST & SAVING

BY

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## PREFACE

THE main aim of the two essays which follow is very simple. They attempt an analysis of the connection which exists between interest and the process of saving whereby wealth is accumulated and capital supplied, and a criticism of the explanations which have been offered as to such connection.

The normal and necessary existence of interest in society, organised on its present basis, is briefly treated. It is stated rather than argued that interest finds its cause in the relation between the supply of and the demand for capital, and in the need of distributing a somewhat limited amount among those demanding it, and presumably best able to use it. Further, it is not questioned that under a competitive system of industry the fund thus raised passes almost inevitably into the hands of those who save. But the essays, and especially the first and more important, deal with the results of such apportionment in respect of accumulation. Thus they seek to determine if any effect, and if any, what effect, is produced upon saving by interest. This problem presents itself in two forms. On the one hand there is the question as

to any essential or permanent causal connection, and, on the other hand, the equally interesting, though not equally important, question as to the existence of some relationship at the present time. Again, the two considerations of the effect of alterations in the rate and of the need for some minimum rate so far as supply is concerned are discussed.

It must not be forgotten that the function and effect of interest in this direction is by no means necessarily the same at all times and under all conditions. Thus, in one social phase it is more than probable that interest is instrumental in ensuring the active industrial employment of the wealth which is postponed from immediate use. Again, another phase sees wealth deferred and accumulated partly, at any rate, in consequence of the increase which appears in the shape of interest. Lastly, in another phase, and owing to the prevalence of particular conditions, a certain minimum rate causes such readjustment in the objects of saving that a greater total accumulation ensues.

The aim of this volume is to examine the extent to which such forces and tendencies hold good at the present day, and further, if they or rather their results are rightly regarded as essential and permanent.

E. C. K. G.

UNIVERSITY OF LIVERPOOL,  
*January 20, 1906.*

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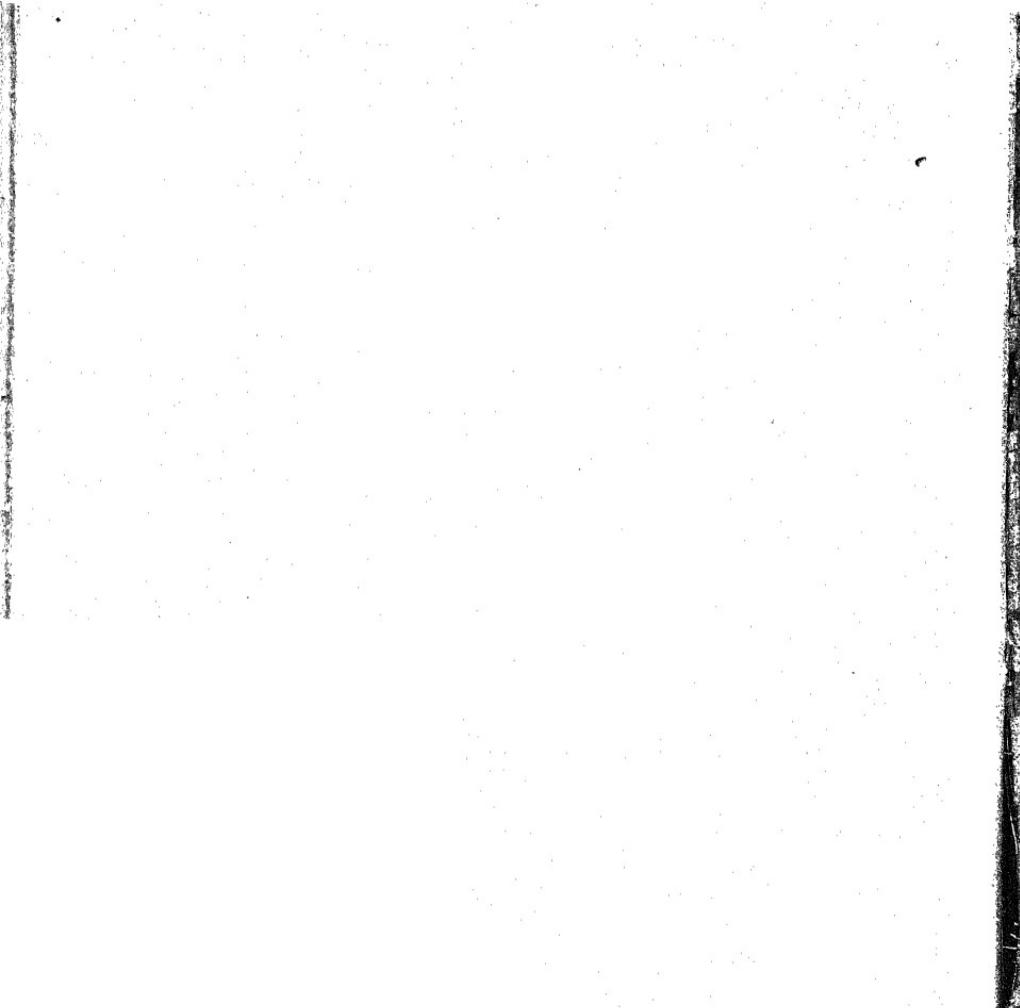
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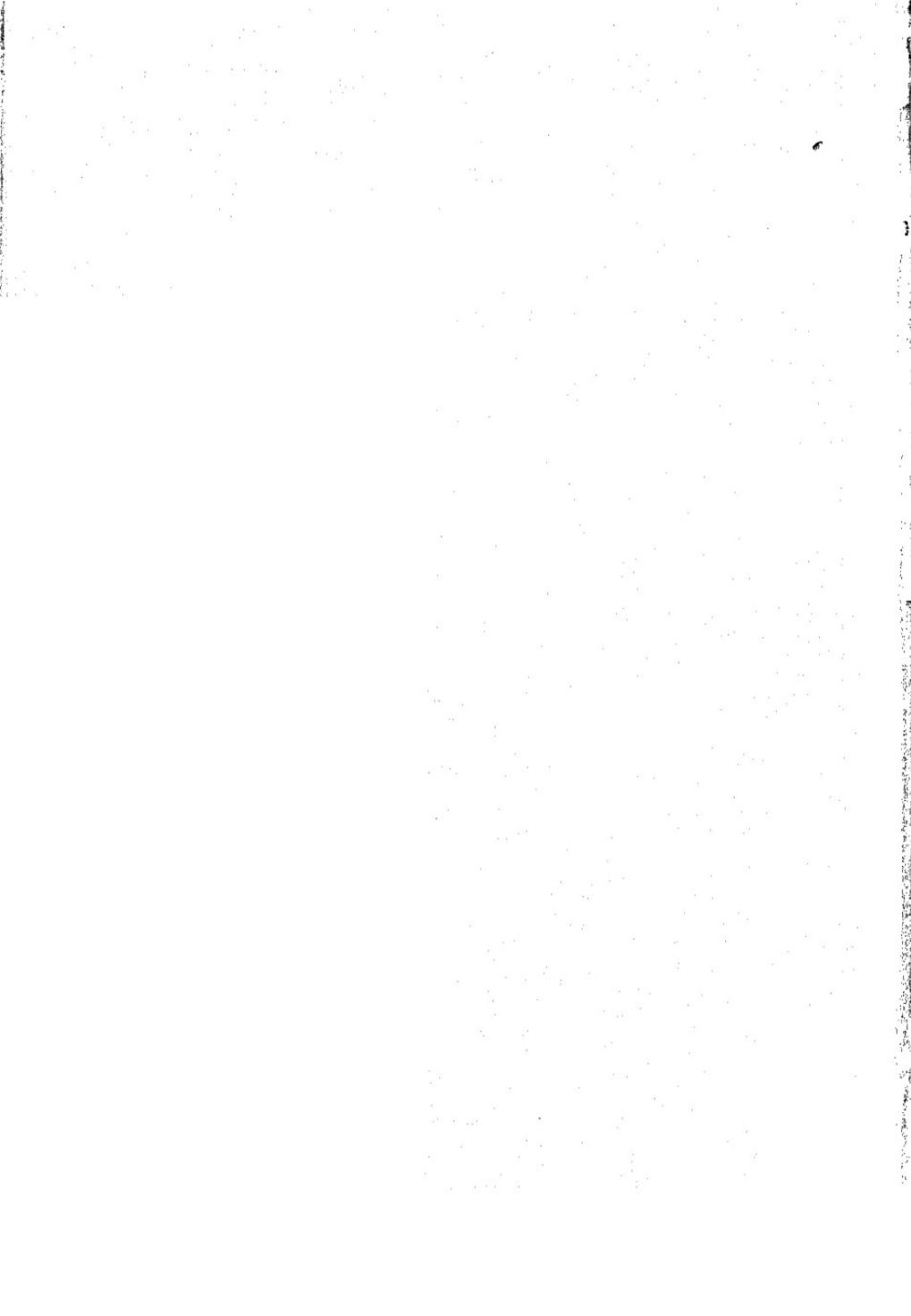
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**PART I**

**INTEREST AND SAVING**



## CHAPTER I

### OBJECTS OF SAVING

IN a consideration of the nature of saving, the objects which present themselves to the mind of those who save, and constitute the incentive to their action, require careful attention. They dictate, as it were, the process, and so peculiarities affecting them, especially such as are concerned with their satisfaction, may affect the very act of saving itself. When we know why saving takes place, we shall be on the road to know how and with what results it is performed.

To enumerate all the objects in view of which men save, would be a difficult and also a somewhat futile task. Saving, after all, is no occult process. It is a means of providing for future enjoyment out of other than future earnings; and future wants, like present wants, are innumerable. But though a detailed list cannot be given, some of the more distinctive require mention before we proceed to the consideration of the classification of future wants and their leading characteristics. Men save, on the one hand, against emergencies. They save by way of provision in the event of accident or illness, or, in many cases, want of employment.

Again, they make provision for others, mainly for their family, in view of their death or of some other contingency. They save for educational purposes and for the future settlement of their children in some calling or profession. But apart from these purposes come other purposes where saving takes place less on account of particular and novel needs than in view of a possible cessation of the income whereby present wants are met. Here the case of retirement, either partial or complete, by reason of ill health or for the sake of greater leisure, occupies attention. To some extent it is connected with the casual want of employment, though in a sense it differs as being less contingent and more deliberate and foreseen. A man provides *against* the loss involved by lack of employment, but he provides *for* the leisure sought by retirement. In the one case, apprehension, in the other, anticipation governs his action. Lastly, we must take into account those occasions of present economy which arise from the desire to gratify tastes and ambitions incapable of satisfaction out of existing income. These range from the saving which takes place for some especial object to that involved in the general effort to be better off in the future than in the present. A continental tour or the acquisition of a picture will illustrate the former, though the variation in degree in this case is infinite. The desire to be better off differs in respect of its less definite nature, its more imperceptible gradations, and its capacity for almost unlimited extension. It includes the satisfaction of wants in the future which are felt in the present, but which are not gratified through lack of means.

From what has been said, it will be seen that the objects of saving and the impulses which inspire it may be roughly classified under three headings. First of all are those contingent on occurrences such as accident, illness, premature decay, or other special mishaps which must be provided against despite their uncertainty. Here the needs for which provision is made do not exist now either specifically or in kind, and in some instances may never exist at all. In the case of provision for a family at death, though uncertainty undoubtedly exists as far as the particular people to be benefited are concerned, it enters less into calculation than where accident and illness form the matters under consideration.

Second in order are wants satisfied at present out of immediate income, but which in the future, by reason of the cessation of this source, would remain ungratified but for the provision made in the present. As has been said, provision made in this case is made for an occasion anticipated with more or less equanimity, rather than against an emergency contemplated indeed, but only to be deprecated. The provision made for a family at death taking place not prematurely but in the due course of nature, should be included under this heading.

The third class consists of those cases where saving takes place in order to provide enjoyments or satisfactions which, while present as far as desire is concerned, are impossible on the basis of present income; which, in other words, must be satisfied in the future or not at all. Of these there are two kinds—occasional, as where some particular luxury is sought; or permanent, where the aim is the attainment

of a better general standard of living. Under this are included not novel satisfactions only, but ordinary or existing satisfactions in a heightened form. Thus a carriage stands side by side with a larger house, or with the possibilities of better education for children, as part of the greater comforts in anticipation of which present economy is endured.

The objects of saving thus classified present both points of resemblance and points of difference demanding careful attention.

In the first place, it must be noticed that each class is made up of separate and distinct objects which stand in very various degrees of relation to each other. This is still more true of the objects of saving as a whole. Here, as indeed in the case of the different classes, it is important to observe the entire separation that may exist between the various aims which are before the man who saves. Saving does not take place in view of one common though composite aim, consisting of sundry minor parts imperceptibly shading off into each other. On the contrary, the various objects, though classified together and liable to be satisfied out of a common fund, are often quite separate and distinct. One man may save to make provision against accident, another for old age, another to attain some luxury at present beyond his reach, and another to leave behind him large accumulations. No doubt most are swayed by more than one consideration; but equally beyond doubt is the fact that different considerations are of different importance with different men. This is not without effect on the amount of saving involved. Thus the man who saves against

the temporary need involved in accident or illness, or again for a longer holiday than usual, will put by much less than he who desires to retire at an early age, or by means of his savings to rise into a new grade in life, or to have a house in the country as well as a house in town. Even social ambition may imply saving, for increased wealth will aid in its fulfilment. The existence of the objects of saving in these water-tight compartments depends to some extent on the class under which they fall. Such separation is truer of those in the first two classes than of those in the last. In the case of provision against emergency it might seem as though prudence would imply an all-round provision; but, in reality, prudence will lead each man to save against those contingencies to which he feels himself liable. Thus a delicate man will save against sickness; a man exposed to risk and a man whose work is uncertain against danger or want of work. Here, indeed, it must be remembered that the determination of man to make provision against two or more risks though it will undoubtedly increase his present economy and his accumulation will not necessarily increase them proportionately, since the fund accumulated will not be separately ear-marked. Even in this case, however, a fresh object of saving and a fresh cause of anxiety will occasion new accumulation. In the second class this will still more be the case, as each object to be satisfied is an object contemplated as practically certain. This is equally true when we take the objects in the third class, though here, as suggested above, distinction into separate and disconnected objects of saving is less possible. It

is possible, so far as particular and temporary luxuries are concerned, since a man who saves for one "treat" may not save for another; but in the case of the desire to be better off we encounter a co-ordinated series of wants forming integral parts of a common whole. Saving here is more continuous and less, as it were, step by step. In the one case the tap is turned on into a tank; in the other case the same amount of water is drawn off but into separate pails. First one pail is filled, then another; but between the filling of each pail there is a pause. So after the gratification of one want and that of another, a new resolve finds place, whereas in the general determination to improve the position, there is rather one continuous and growing determination than a series of separate resolves.

In the second place, the nature of certain of the needs for which provision is sought makes the probability or possibility of complete or fairly complete satisfaction a condition of saving. This is particularly the case when accident and illness and their consequent expenses are considered. The alternative before the man who deliberates whether he will save, is the enjoyment of certain additional pleasures or comforts in the present and the immediate future, or the sacrifice of these in favour of security from certain risks and dangers. Unless he can save enough he will be tempted not to save at all but to enjoy. In other words, security, if that be his aim, must be complete, or fairly complete. The same may be said of those economies practised in view of retirement, for here too, unless there be some chance of saving enough to make retirement safe and a legitimate

aspiration, its influence as an incentive to present sacrifice will vanish. But it may be asked if this is a general characteristic of future as contrasted with present expenditure, or if it be rather the particular characteristic of certain forms of such far-off expenditure. To some extent the principle may be capable of general application. Future wants present themselves to the mind in more rigidly conceived outlines than is the case with those of the present. In future expenditure the items stand in greater prominence than in that of the present, when money in the hand acquires a curious and disconcerting fluidity. But when the desire lying behind economy is that of *being better off* in the future than the present, this contrast is less obvious. The utmost that can be said of the principle as a general one is, that it is more forcible in reference to future than present wants, because those who save tend to contemplate future wants with a greater definiteness, and that certain future wants are more definite in nature than those which confront us in the present. This last point, however, raises the question of special applicability in the case of certain of the objects for which men save. A distinction is obvious here between those wants, which like those in the first class, and some of those in the second class, are assurable in nature and the rest. In the case of accident and illness, in the case of family provision at early death, and to a considerable extent in the case of retirement, men insure themselves against certain risks, or possible and even probable needs. But it is the essence of an insurance that it be adequate. Inadequate insurance will tempt few, and the less sufficient the insurance, the greater the

temptation to leave all to future luck, and to eat and be merry in the present. Men ask every day, why save at all in view of retirement if it be clear that it is impossible to save enough.

In the third place, we must consider how far the objects of saving are affected by present income or means, and changes in it. A very marked difference in this respect manifests itself between the three classes under which the objects have been classified. So far as the first class is concerned, where consideration of assurance against contingencies governs action, present income has only an indirect and rather distant influence. Minor differences have little or no effect; it is only when the difference in income is such as to involve a change from one grade of life to another that the nature of the provision required in the case of these emergencies undergoes an important change. Further, it must be remembered that the proportion of the possible expenses contemplated on their account is small as compared with the entire income. Quite other is the relation in the case of retirement, or in those matters under the second heading, where a cessation of means leaves wants, previously indulged and so things of habit, unsatisfied. Here the relation between present income and the object of saving is immediate and influential. A rise in income implies a corresponding rise in the quantity of wealth required to make provision for the future, except so far as that rise takes place at a period when greater expenses are obviously incurred than will be the case in the future. But putting this on one side, alterations in present income, carrying with them as they do alterations in the standard of life, tend to perpetuate themselves and

to find an echo in the needs contemplated in the future. Saving which takes place in view of the desire to be better off is differently affected again. Here, indeed, the general principle would seem to be, that a rise in income would be followed by a fall in desire, and a fall in income by an augmentation in the extent to which saving is stimulated, since fresh increments of enjoyment diminish in their utility as the area of desire already satisfied enlarges. But this requires considerable modification in view of the actual conditions of social life. The existence of several different and well-defined social grades is one of the features of modern life; while another is the extent to which wealth is a means and to some a condition of entry into a higher from a lower grade. If this be so, it is quite conceivable that an increase in income may rather quicken than diminish the desire to be better off. New possibilities present themselves and with them new expenses appear, with the result that the ambitious who desire to rise, and now first realise the possibility of rising, will make more strenuous efforts to amass the wealth which is one of the conditions of that change of grade. Still, this case is probably exceptional, and with savings falling under this third head, a rise in means may be said to occasion in most instances a falling off in desire and so in proportion. A thorough-going neglect of this principle is found in the miser, who saves and hoards irrespective of standards of utility; and to whom a larger income is a larger area over which to exercise economy. A miser is one who always is to be but never is better off. But genuine miserliness is too rare a feature to affect the general rule. Hitherto attention has been

devoted in the main to the effect likely to be produced on saving by a rise in the present standard of living, but the effect of a fall might be similarly treated.

The standard of living in the present places a limit on the extent to which saving will proceed, by reason of its restrictive influence on the estimates to be formed of future wants. From this point of view it is obvious that saving, which has as its aim the provision for certain emergencies, will be limited to some extent by the general scale in accordance with which life is regulated. This is equally true of those cases where the object is the provision of new means to supply the place of those whose cessation is anticipated. The life to be maintained will be calculated in the light of that which has been maintained. But can the same, it may be urged, be said of those who seek an improvement in their position and indulgences novel and greater than those which have been possible. In this case a stationary standard of living is compatible with very differing efforts in the attempts to improve the position. These vary owing to external causes, and are largely independent of the existing standard in income. A fall in this, in one way may make saving for this purpose even keener and its quantity even greater. The point, however, of most importance both in the case of stationary conditions of income, and in that of rising incomes, is the difference between the close relationship between present income and that sought for the future in the case of saving, which has as its objects the satisfaction of wants classified under, at any rate, the second heading, and the loose connection in the case of that saving

which finds its origin in the more general desire to be better off and to enjoy comforts formerly unattainable. The estimate of what is necessary to provide for retirement, or in other ways to continue life on the customary scale, obviously rests on the standard enjoyed in the present.

What has been said with regard to the differences thus existing between the motives governing action in those various kinds of saving, depends for some part of its importance upon the possible determination of the extent to which different motives are predominant in a society at any given time. If that be ascertained, the nature of the aim in view of which saving proceeds will be clear. But so far as quantity is concerned, this seems incapable of any definite decision. Even a careful investigation of different social epochs will do little more than indicate the greater prominence of some one or other feature, and it is by no means certain that prominence implies superiority in actual quantitative results. It will always be difficult to discover the motive which determines the accumulation of the great mass of wealth reserved for future purposes. And yet if our epochs be large enough, some surmise may be possible. The needs of modern life, and the objects which involve saving at the present, seem of all things the most distant from the conception swaying the actions and shaping the policy of primitive people. In many respects tribal life and tribal obligations rendered saving superfluous; while, moreover, risk and emergency with their hard necessities and retribution were lessons which man in his earliest stages never learned. Saving, when it took place, was rather a preparation for greater

dexterity in the chase or in the field than an accumulation of a store on which to fall back in time of hardship, weakness, and want. Risk and the future provision against accident and in view of coming needs are, so far as practical effect is concerned, modern conceptions. Still, they do not stand alone in their influence on saving. The love of comfort, the desire for wealth as power, and even for wealth as wealth, mingle with them. Some classes, and some members of some classes, are more subject to one, others to another of these motives. Analysis does not reveal the share they take in determining accumulation. It may seem that in many cases the desire for security in view of accident and illness and premature decease, the assurable objects of saving, so to speak, though an auxiliary motive, is no longer the effective motive determining saving. Insurance against such ills is provided by wealth accumulated for other aims, but capable of being diverted to these. Still, the hoards of insurance companies and the funds of friendly societies show how great is the part still played by the apprehension of ill.

A matter which largely affects the question of motive is the age at which saving takes place. With years comes an inevitable change in the prospect before the individual, and so the objects which at one time inspire the postponement of the consumption of wealth vanish to be replaced by others. Probably risks present themselves at an early period; later, the prospect of retirement and the wish to be better off, and to indulge in greater luxuries and novel enjoyments; while with advancing years the

latter aim grows less dominant, and a secure old age, an established family, and the reputation of great wealth grow into prominence.

Neither in this instance nor in that previously considered is a precise determination possible. Little more can be said than that the objects of saving differ with different people and at different periods, and alter with changing age. This change and this difference are themselves facts. Saving is no uniform process pursued on account of one common, though composite aim, and under one uniform impulse. Its objects are many, and often but little connected; variation rather than uniformity is its law. How little uniformity there is will have been revealed by what has been said respecting the different classes into which the objects of saving have been divided.

Three points were raised. With regard to the first, the consideration of wants as a series of separate compartments to be filled in turn, it was seen that whilst this is in general more true of future than present wants, it has a special force in the case of the wants termed assurable. The second, concerning the need of reasonable certainty as to the possibility of adequate saving, affects both assurable wants and also those under the second heading, where the question of retirement and leisure is of great prominence. It is of less importance in the case of those who have as a general aim the desire to improve their position; though even here, owing to the curious division of society into grades not unaffected by pecuniary considerations, it may affect the action of many. As to the third point: the present standard or income, while affecting to some

degree the extent of the provision which seems necessary as against risk, is of far greater consequence in the case of saving undergone to supply the place of present means. Its connection with the more general saving placed in the third class is less easy to decide.

The differences indicated in the foregoing discussion between the various objects of saving suggest the distinction of these into two fundamental groups. The antithesis between the objects involved in risk and retirement, that is, in the desire *not to be worse off*, and those comprised in the desire *to be better off*, is essential, and other than the differences in nature and cause which distinguish those grouped under these general headings. To save against new wants and to provide for the lapse of present income differ; but in respect of the end set before those who postpone, they are closely related and very distinct from the saving which takes place at the behest of the instinct to improve the position and secure better general conditions. They are more definite and demand a prospect of adequate satisfaction. It, on the other hand, is less definite and, in consequence, less imperative in its requirement of completeness in satisfaction. But there are two respects in which the difference is even more important and requires greater emphasis. In the first place, the former in the main give expression to the desire not to be worse off, and so have a superior limit imposed on their extent. While in some cases fixed possibilities and conditions play a part in determining the saving required, the standard according to which life is being lived governs and so limits the standard of

satisfaction contemplated in the future. To increase present consumption is to increase the scope of future requirements; to diminish the former is to diminish this as well. When the means for meeting future wants are withdrawn from the satisfaction of the present, this consideration must be of great weight. But when we turn to those objects where present satisfactions and standards are the starting-point the matter is changed. These constitute an inferior but not a superior limit. They do not impose a barrier against unrestricted and indefinite increase in future demand. In the second place, the wants included in the first group are felt with regard to the future and are obviously future in their satisfaction. So far as the present is concerned, they do not exist. This is not so with those of the second group. This desire to be better off is part of the general desire for wealth and greater comfort and luxury, and its connection with the future is incidental rather than essential, and by reason of future possibilities of satisfaction rather than owing to any desire to make the future as such more full of material satisfaction than the present. It is true that this is counteracted in part by the tendency to separate life into a time of work and a time of enjoyment. But allowing for this, the association or rather the identity of the want thus satisfied in the future with the general desire for wealth, indicates its indefinite and almost unrestricted character.

Saving which responds to these differing requirements may be expected to proceed along different lines and to be differently affected by particular circumstances.

## CHAPTER II

### METHODS OF SAVING

IN early times the conditions under which saving took place were much more simple than those which exist now. As has already been intimated, many motives which now lead to a present economy were scarcely felt and of but little importance. The risks of life, great though they were among a semi-barbarous people, or perhaps because so great, were seldom the objects of provision, while many of the wants which now stimulate action did not exist. A small store of food and some few other necessaries was accumulated in such a way as to suggest as little forethought as possible. But in addition to this comparative simplicity of desire, there was a certain simple directness in method. A small reserve and the desire to be better off by being better equipped were the two aims comprised in saving; and each of these was met by separate means. There was no common fund capable of serving equally at one moment for one, and at another moment for another purpose. Only in a few cases was this possible. The scant store of food might be consumed under circumstances of idleness arising from different causes. But here its uses ceased. It could not effect a regular

increase in the means of living at the disposal of its possessor. To produce such a change in his position he had to take other and very different measures. Time, which might have been employed in the production of some commodities either for immediate consumption or to serve as a store for use in future need, had to be devoted to the making of some superior instrument for the chase or for agricultural purposes, if the agricultural stage was reached. So the two objects of saving were differently provided for, and the method employed, while suited to the satisfaction of the specific need, would have proved futile for other purposes. Saving as a provision and saving for continued profit and increased efficiency are totally distinct. The objects are different, the funds are different, and the methods are different. As to aim: in the one case a reserve of commodities to be consumed in time of need is sought; in the other, improved appliances to increase the efficiency of labour. As to the distinction between the funds, it is obvious that the articles employed for the one purpose are inapplicable to the other. But this comes out even more clearly when the methods of use with their respective characteristics are considered. In this connection it is obvious that in the earlier case the commodities exist in kind specifically adapted for the satisfaction of peculiar wants. The future want for food, if it enter into contemplation, is a motive for the accumulation of a store of food; the want of clothing, for a store of clothing, and so on. No doubt food, or clothing, or other commodities, if accumulated into a store in view of want arising from certain anticipated causes, may serve as a means of

satisfying such wants, whether arising from the anticipated or from other causes, and thus far some modification of their restricted and specific character is introduced; but their use for any other purpose than that originally contemplated does not extend far. The store of food cannot be used in place of clothing, or clothing in place of food. Still less can saving made in view of a reserve avail the man who suddenly demands improved means for aiding him in his toil. Accumulated wealth as a reserve and as capital are distinct in conception and separate in fact. Considerable disadvantages are involved in saving in early times in the form alone possible. Provision for the future under conditions such as these means a definite calculation as to particular needs; and this can only be possible when such needs are few and conspicuous. Even then in the one case the possibility of an accumulation of the wrong things always exists, while in the other case the utility of the instrument provided depends on continued health and strength on the part of the individual. Though weapons and tools must have gradually become capable of exchange, their earlier utility consists in the income to be attained by their use, and not in any value as articles for exchange.

Saving in our modern economic organisations presents an entire contrast to that sketched above. The accumulation of specific commodities for future use vanishes, and the reserve is almost entirely available for capital use; it might almost be said that it exists by reason of its capital use.

On this blending of reserve and capital, to use

this term in the sense employed above, some few words are necessary as to cause, circumstances, and results.

The cause lies partly in the difficulty of accumulating specific things in an intricate society, partly in the machinery which exists as a means of saving. In the first place, it is difficult to accumulate in kind when wants are numerous and varying; not only would space and expense be considerations, but the risk of finding that the wrong things have been provided would probably exceed any of the risks in view of which much of this accumulation proceeds. In the second place, saving in specie is eminently insecure. In the third place, deposit in banks means capital employment under the guarantee of the particular corporation concerned to produce the total sum on demand. In the fourth place, the adoption of this last method when consciously performed leads inevitably to direct investment. Quite apart from the advantages in the way of interest on bank deposits or investments, it may be contended that greater security is attained and less risk involved by saving under these conditions than by accumulation in kind, or the personal custody of specie or bullion.

Of the circumstances attending this identification, as it were, of the results of saving for two purposes, one at least needs further consideration. That wealth stored by way of reserve is available for use as productive capital has been assumed; the possibility of its withdrawal, or rather of the demand for its withdrawal, introduces an element of uncertainty to those who use the capital, but after all but a slight one compared with the uncertainty which is the lot of

those who may wish to withdraw it. At first sight it may seem as if this prevents any real identification. It may be argued that in point of reality a reserve ceases to be a reserve when invested as productive capital; that it loses the form of a reserve, and ceases to be available in the case of the events in view of which it was originally accumulated. But the whole question turns on the existence of an average between those who wish to withdraw and those who may wish to invest, or rather, to be accurate, on the extent of such an average as a basis of practice. A sudden demand for all reserve funds could, of course, not be met; but so long as those anxious to accumulate and place in capital use their savings are approximately equal to those wishing to withdraw and turn their savings to immediate use, realisability is maintained. It has been suggested, however, that the existence of interest has removed all desire to withdraw the main, or, as it would be termed, the *capital sum*; that all that occurs is a desire to change its investment; and that therefore the blending of saving as a reserve necessarily implies the use of what is saved as capital, since without such use no interest would be forthcoming. This is not a matter of great importance at this stage of the discussion, but with reference to it, it is well to point out, firstly, that use is oftentimes required of the total sum saved, and, secondly, that the existence of interest is no fundamental condition of saving, though it may affect its form and in certain phases its amount. With or without interest, objects of saving exist, and with or without interest, efforts will be made to satisfy the wants they represent. The uncertainty of life, no doubt, has made many anxious to accumulate

so much that risks, wants, and desire for luxury may be duly met out of interest without any decrease of the total sum which is the basis of its annual payment. But this only holds good in some cases, and at any rate is no inseparable condition of saving.

The consequences of this close connection between the reserve accumulated and its capital use are important. The allurement of interest in addition to the other advantages offered by this mode of keeping the store, practically secures the investment, direct or indirect, of all the funds saved, whether saved in view of such use or not. Wealth accumulated will be invested in capital forms and subjected to the many conditions which are attached to such investments. So far as form is concerned, instead of being such as to satisfy the want of the people who save, it becomes suitable only to the wishes of those who use it and act as its guardians. It is appropriate to the wants no longer of its owners but of its users. Formerly the amount of capital depended on the extent to which the immediate consumption of wealth was foregone, and the efforts, which might have satisfied it, directed to the production of goods, capable of serving in and facilitating further production ; but now it is increased by all the wealth saved by way of provision for the other numerous wants which beset the future. On the other hand, and as correlative of the above, is the demand and receipt of interest by those who save against risks and retirement, and so under conditions which at one time allowed of no capital use and of no interest. People would make provision for accident and illness, and in many cases for retirement and leisure, were there no such thing as interest ; but

though it be no object with them, they will require it, if it be generally offered for the use of capital. One, and, to all appearance, a singular result is, that in many instances interest will actually diminish the amount of saving practised; but this leads to a subject of future discussion.

Of the different groups of motives which have been stated as constituting the aim of those who save, one only, and that the last, is essentially connected with the use of what is saved in production. In this case postponement takes place, under which may be termed the desire of gain. This corresponds with the particular process under which primitive man sought by saving to improve his methods of production either in agriculture or in the chase. On the other hand, saving in view of illness or other eventualities, such as retirement, may be taken as the later form into which the primitive desire for a reserve develops.

As has been pointed out, at one time these forms of saving were obviously separate and distinct. A reserve was a reserve, and was present in the specific form in which its use was anticipated. On the other hand, capital was not a reserve, and was incapable of being used as such. It could not be realised. But in the growth of a social system, and owing very largely to the greater security provided by active use, postponement takes place in a common form despite the difference of motive. The fund which is saved as a reserve is employed in production, and loses part of its realisable character, though it gains by being realisable in kind as occasion demands; while productive improvements gain a realisability which formerly they never possessed. The union of these two

elements has the most important effect upon the position of interest.

The foregoing considerations acquire new importance in view of the great part played amongst us by the desire for insurance and a reserve in determining and stimulating saving. Thrift is an impulse of modern growth. It is a distinctive mark of the present as contrasted with the past, and is part of the extension of thought from the immediate to the more distant, which, alike in reference to things of time and of place, has been the slow, if sure, growth of generations and centuries. On the one hand, the family yields to the tribe, the tribe to the nation, and the nation to the empire. On the other hand, the individual life in place of being a series of successive moments of desire and satisfaction always conceived of in the present, becomes a correlated whole in which the future with its possibilities and needs takes its place alongside of the present. With this change, the putting off of satisfaction to a period more or less remote increases in its force. It is a growing tendency, which, be it observed, depends for its indulgence on the capitalistic system under which, while incurring certain risks, it can be practised without rigid limits and with the advantage of interest, even though this is no fundamental condition of its practice or even of its existence as a motive to saving.

The position of the past with regard to saving and the use of what might be saved was vastly different from anything with which we are now acquainted in practice. Not only were future wants and the future itself conceptions of little force, owing partly and perhaps mainly to the inability of primitive man to

think of the future in any concrete way, but partly to the great uncertainty of life and the lack of security. But even had they been more present and so more potent, sundry difficulties stood in the way of giving them effect. The circumstances of early life, with its lack of easy exchange and interchange, allowed no room for that law of average whereby men can save generally and not in kind. Saving must always be of things, but if the area of life be wide, things saved by one man if no longer wanted by him may be made part of an exchange whereby the various parties satisfy their different wants. But this is a modern condition. Even improved weapons and implements, produced not of course as a reserve, but under that other instinct impelling postponement, the desire to be better off, though occasionally changeable for a supply of food must often have been in the position of specialised plant. Though wants were comparatively few, the difficulties of saving in kind must have been great and prohibitive of its being practised in excess of certain very restricted requirements. Again, the few possible uses of capital interfered with any great development on the other side. The field of employment was small and rapidly filled. Even when we pass from primitive times to ancient civilisations and the mediaeval period, differences still existed sufficiently great to account in part for the difference of view then held with regard to the exaction of interest for loans. Not only could these seldom be employed productively, but in addition, at any rate in the early Middle Ages, accumulation save of a few simple things and of ornaments must have seemed a definitely calculated means of extortion. On the

one hand, it must have been difficult to understand the motives at work in the mind of an individual taking such account of the future. On the other hand, saving even if desirable in itself, would seem impracticable; money itself was at times so scarce as to be practically unattainable. No doubt, in stern logic, the existence of loans at all should have proved the easy possibility of provision for the future. But loans for capital use were not frequent; and saving in kind, under conditions of exchange such as to make such savings generally applicable, was almost impossible.

It is from considerations like the foregoing that capital is sometimes said to be a social phenomenon, or social in its nature. This does not mean that saving does not take place, or that capital cannot exist in stages where the individual or the small group is everything and society nothing, but only that capital as it exists is a factor and result of society and very different from capital in other less developed conditions. Under the present social organisation there is an identification of the wealth postponed and accumulated as a reserve and that which is employed in the processes of production to facilitate enterprise and as a preliminary to combination. So far is this the case, that investment in the recurrent mechanism of production is the safest means of providing a readily accessible store for use in need and in the future; by its means accumulation can be carried to a far greater extent than would otherwise be possible. Involved in the creation of such capital are, on the one hand, those who save, swayed by very varying desires, which extend from

the simple wish to insure against risk to the more complex desire to be better off; on the other hand, those who can employ and who demand capital things without being able or anxious to postpone their own consumption. To use metaphors, a field of investment is provided for the one, a stream of capital for the other.

Changes take place, as a necessary consequence, in the nature of accumulations, and first of all in their form: what is saved is no longer endued with qualities specific to the satisfaction of the desire in response to which it is saved; or, to go further, in many cases it ceases to exist in what may be called primary forms, that is, in commodities which will satisfy ultimate desires and so justify those who save to themselves. Secondly, with the receipt of interest, the income, and not the total sum, in many cases becomes the measure and the stimulus to saving. Uncertainty of life leads the individual to save for a future which belongs rather to society than to him, and so the capital means at the disposal of the community may be greatly increased. Thirdly, the security or insecurity of what is saved differs in its nature from that of saving in kind. In the latter case, the form of the saving may be wrong; in the former, it may prove impossible to realise at the time when the conversion from capital as capital into capital as reserve is demanded. In this respect the consideration of interest is of particular importance, since it may be contended that some rate of interest is necessary as a check on such process of conversion, and so on the diminution of productive capital.

In view of these considerations, capital is surely well termed a social phenomenon.

## CHAPTER III

### THE DETERMINATION TO SAVE OR POSTPONE

THE determination to save rests on what seems at first a simple matter, the desire to have the spending of a certain quantity of purchasing power in the future instead of in the present. This implies a preference for future over present consumption, and a consequent decision to indulge the one at the expense of the other. The satisfactions thus balanced against one another are the satisfactions anticipated from a future act of consumption, and those anticipated indeed, but so closely as to be almost a present enjoyment, from consumption in the present; and the decision to postpone is the preference of the individual living in the present for the former above the latter. There is no comparison between the present enjoyment and that which actually takes place in the future, for it is the enjoyment expected and not that which is subsequently experienced which is a factor at the time, that is, the present time, when the decision is made.

But simple though the decision is in its nature, the comparison on which it is based is quite otherwise. Its essential complexity is evident as soon as we ask ourselves in respect of what can the future and

the present be compared, and what can be assumed in such comparison. Here, what has been said with reference to the objects of consumption is so pertinent as to justify repetition. These have been divided into three classes. Firstly, there are wants incurred by reason of certain contingencies, against which prudence enjoins provision; secondly, there are certain needs satisfied indeed in the present, but for which means of satisfaction will be lacking, or probably lacking, in the future; while, thirdly and lastly, there are objects and wants, the gratification of which, though desired now, can only be achieved by present denial of other wants to secure future enjoyment both of those thus foregone and of those in favour of which present abstinence is endured.

The comparison of the present and the future in this connection involves the consideration of the wants and means respectively experienced and anticipated at the two periods.

In the case of wants it is possible to differentiate in some important respects between the three classes enumerated above. Those, for instance, in the first class, arising out of certain contingencies of accident and illness, are in addition to and not in continuation of those now experienced. As to urgency, distance in time and uncertainty alone can prevent them from preceding many of the wants requiring and receiving satisfaction in the present; and those factors are operative, it should be remembered, in varying and on the whole in decreasing degree. On their withdrawal, these novel wants of the future will oust as to priority of satisfaction many present demands for things other than those necessary for the maintenance

of life. With them would rank wants anticipated as concomitant with old age, if such be likely to exceed in amount those of present age. But this seems more than doubtful. While age brings with it certain new needs, other needs disappear with its approach, and as it is assumed, so far as this part of the argument goes, that the present income continues unaffected, similarity in amount and not in kind is the matter at issue. The wants at different periods in life differ considerably. On the whole, and so far as amount is concerned, it is probable that those of middle life rank highest. At that age the enjoyments of younger life are not outgrown, while the desire for comfort begins to make itself felt. Social ambitions, and to take a totally different matter, educational needs increase the expenses. In old age the costly pleasures of other ages yield to home life and the luxury of comfort, while in most cases educational and other expenses connected with the settlement of children diminish or even disappear. The so-called needs of age are rather a result of a deficiency in means than of any absolute increase in wants themselves. Wants of the second class, then, are rather comparative than absolute so far as increase is concerned. They are not novel in any true sense. The third class of wants, while new so far as the possibility of satisfaction is concerned, are not new in any other sense of the word. People desire to be better off, but they do not desire to be better off in the future rather than in the present. Were the choice theirs, they would almost certainly elect to be better off at once and without delay. But if the choice be between the future or nothing, they will choose the future and subordinate to it certain

present gratifications. Saving up for more lavish consumption is an important factor in the economy of life. It has two forms. It may be occasional and intermittent, in which case periods of economy and of free expenditure follow each other and recur. In the more permanent form abstinence is practised for a time in order to secure an improved standard for the remainder of life. A close examination of cases occurring under these headings suggest different motives as possibly operative, that is, as giving rise to a preference for future over immediate consumption. In the first place, cases occur in which greater enjoyment is anticipated from a given increment consumed simultaneously and in conjunction with other increments in the future than from its immediate consumption by itself. The larger want satisfied in its entirety is greater than the sum of the small wants capable of satisfaction successively. Saving up for a treat is a well-known phenomenon. Secondly, cases would seem to occur in which individuals after practising saving up to the point sufficient to provide for the satisfaction of wants in the future on a scale equal to that in the present, still continue saving; that is, they give up the present satisfaction of a particular want in the scale of wants for the satisfaction of this very want in the future, or even of a want admittedly lower in the scale. In other words, a less urgent want in the future is acquiring predominance over a more urgent want in the present, because it is in the future. But cases like these when they occur, arise from the habit, common to many, of dividing their lives into a working and so to speak non-enjoying half and a half of enjoyment.

Sometimes, indeed, the want, though in a certain sense quite conceivable in the present, is not actively felt because of lack of time for enjoyment. But these cases come very close to the cases previously considered where a future period of life has greater wants than has the present. Thirdly and lastly, there are the important cases in which the alternative is between certain wants and so certain satisfactions provided by a given amount of means in the present and the more numerous wants, and so the greater satisfactions to be obtained in the future through an increase in the means by reason of deferment. Here considerations of interest play their part. The satisfaction possible now is balanced against the greater satisfaction possible by such means in the future.

The comparison, partly conscious and partly unconscious, of future and present means is more simple than has been the case with wants. It has been urged by some that an innate sanguineness of disposition and a belief in their own capacity leads men to estimate their future powers and their future income highly; that they anticipate larger means in the future than in the present. Sanguineness, however, while to some extent a matter of the time, is still more a matter of individual age. The young undoubtedly and correctly look forward to increased incomes. They picture themselves rising in position and wealth. The growth of experience, the maturing of powers, and the force of seniority combine to justify their expectations and the action to which they give rise. But this attitude is not indefinite. It can be maintained only up to a certain time; after which the process is reversed. After or during middle life

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anticipations as to future powers tend to lose their roseate hues, and men, however sanguine, are imperceptibly forced to recognise that the years before them will bring decrease in activity and a possible fall in income. Of course the age at which the sanguineness of youth yields to forebodings varies greatly with persons and callings. Age has its compensation even from a money-making point of view; and experience, connection, and reputation compensate in many instances for the decrease in activity and decision. Caution may be gained while enterprise is decaying. But only years are wanting to remove those compensations themselves. From the conception of future means the element of interest must for present purposes be eradicated. If it be taken into account, doubtless the balance between the future and the present is weighed down in favour of the former; but as one object of a comparison between future means and needs and those of the present is to discover the reasons for the demand for interest, its existence must not be predicated as a necessary part of future means. Putting it then on one side, anticipation as to future means is very far indeed from being invariably sanguine. So powerful a motive of saving as that implied in retirement, or even leisure, obviously depends on expectations of the opposite nature. By present economy means are sought and a store provided for the due satisfaction of wants, which will continue to be felt when the means of satisfying them diminish. Doubtless the character of the anticipations as to the future varies with the age at which saving is practised, and consequently

the direction in which they tend to affect individuals depends largely on the age at which average people save most; but just in so far as they are sanguine, one powerful motive for saving diminishes. Conversely, just in so far as saving is stimulated by the desire for retirement and greater leisure, the expectation of the future is tinged with doubt and anxiety. The existence of such motives is itself a disproof of high expectations with regard to future means.

The standpoint taken above is that of a comparison of the wants and means of the present with those of the future, without any particular allowance for the difference in the intensities with which these are respectively experienced or conceived of by the man in the present. The question raised has been that of the quantitative relation between these in the present and in the future; the question, that is, whether to any one deliberating as to the immediate or future consumption of a given amount of wealth, the wants of the future are reasonably conceived of as greater than, equal to, or less than those of the present, and likewise the means of the future with regard to the means of the present. From this point of view we have seen that novel wants present themselves in the future, and by way of addition to those needs which constitute the objects of present expenditure. These new wants fall into two main classes—those connected with certain unfortunate contingencies, and those implied in achieving greater satisfactions in the direction of luxury and comfort by the expenditure of a given sum in the future in place of the present, either by reason of its simultaneous consumption with other sums, or because its postponement occasions an actual alteration

in its own amount, or lastly, because the time necessary to enjoyment is lacking in one case, but present in the other. Nor on the other hand is there any substantial ground for anticipating the possession of a larger means in the future than in the present. Indeed the contrary seems most probable. Taken together, these point to an important conclusion, for the impulse to save varies directly with the proportion of future to present wants, but inversely with the proportion of future to present means. A high estimate of future needs is a strong stimulus to saving, a low estimate even a deterrent; a strong anticipation of increased income discourages saving, while anxiety as to its maintenance rouses to acts of present economy.

Time, however, as an element in the keenness with which wants are felt has been ignored. So far as the essential nature of its effect is concerned there is no room for doubt. The satisfaction of the same want in the present and in the future are two different and by no means equal things. It is one thing to work for rewards to be received immediately, another thing for promises which may develop into rewards and satisfactions in the future. Distance in time, just as distance in space, causes a diminution in the object viewed, and so in its effectiveness as an incentive to exertion. Nor are reasons for this difficult to find. They exist quite independently of any risk incurred through postponement and possible loss of that which is postponed. Some such risk undoubtedly exists in the case of all commodities except those actually entering into immediate use. It is present both with the primitive hunter making his little store of dried meat, and the modern merchant investing capital in a limited

company or in railway stock. But if gilt-edged security be selected, the risk is so reduced that it ceases to enter into calculation. Risk of this nature scarcely affects the problem, save in so far as it makes a difference between first-class investments and others of all grades and character; in other words, it affects rather the application of savings than the action of postponement itself. But there are other and more important causes for the lower value attached to future as compared with present consumption. The actual conception of the satisfaction to be derived in the future is less vivid. This perhaps is rather assertion than reason, for it amounts to saying that distant things are less vividly realised, because they are less vivid and also distant. Nevertheless it is true. Again, future consumption is more or less uncertain, not by reason of any want of security of or in the commodity, but because of an incurable defect, the want of certainty, in life. The commodity may remain, but the act of consumption demands the consumer, and satisfaction is incomplete unless the individual be satisfied in whose behoof it has been put aside. Given satisfactions holding a like place in the scale of priority, there can be no doubt that distance operates as a discount of the enjoyment anticipated from those lying in the future.

But, as has already been pointed out, in many cases postponement does not imply merely the substitution for a present satisfaction of one which differs from it in nothing but being future instead of immediate. On the contrary, the wants in favour of which saving takes place are often wants which only require to be realised as vividly to demand satisfaction.

much more urgently than those satisfied. The wants themselves, so far as nature is concerned, are undoubtedly more urgent and rank higher in the scale of need, and if they existed in the present they would call for satisfaction before certain others now satisfied, or about to be satisfied. The only question is, if their future position so discounts them as to place them on a level with or even beneath them. A brief recapitulation of the results stated a few pages back is all that is needed to show how numerous and how important are the cases in which the satisfaction sought by postponement is greater, apart from its future position, than that sacrificed. The emergencies for which provision is sought, so far as they imply needs, are often far more urgent and far more imperative than immediate need for anything but the ordinary necessities of life. These once satisfied, the wants implied in illness and accident and by premature death would, apart from their future nature and also their uncertainty, obviously obtain precedence over the satisfaction of the present desire for comfort or luxury. Again, in the case of retirement the deferment of consumption is not, as it were, the deferment of the satisfaction of the last £200 out of an income of £1000 to rank after an income of £800 in the future, but the deferment of a £200 which in place of furnishing subsidiary enjoyment after the more primary needs have been satisfied out of an income of £800, will itself be turned to the satisfaction of those primary needs in the future. Ornaments, comforts, and luxuries in the present are exchanged for bread and butter in the future. Even when we turn to the third class of wants, those, that is, which form part of

the general desire to be better off, instances occur analogous to the above, as when several increments of wealth simultaneously consumed produce greater enjoyment than if consumed at different times, thus increasing the satisfaction to be obtained from each, or when enjoyment is conceived of as appertaining to the future, the time for enjoyment, and not to the present, the time for toil. In all these cases the future nature of the satisfaction is a possible discount, but its effect depends obviously on the keenness with which future needs and enjoyments are realised.

This, so far as absolute extent is concerned, must be largely a matter of opinion, but three points require notice. Realisation of the future and anxiety as to it, have increased very greatly of recent years. Again, one particular form of this greater sensitiveness to the future is found in the obvious and frequent comparison between its uncertainty and the certainty of the present. The present is known with its satisfactions and its needs, and the present sacrifice incurred in giving up the immediate consumption of a particular amount is definite and can be estimated, but the future is unknown and its risks form an ever-increasing cause for anxiety. Uncertainty weighs more heavily than formerly. Lastly, the tendency to separate life into two parts, one for work and one for play, with its natural results on the relative wants of the two periods has a not inconsiderable effect.

Certain of the conclusions reached are sufficiently important to deserve recapitulation.

(a) Risks such as accident, illness, and the like, together with some other objects of saving, are in the main measurable as to both their probability and the

expenditure needed for their satisfaction. Alterations in present means and the style of living do not occasion corresponding alterations either in these needs or in the expense of meeting them.

(b) Saving which takes place in view of retirement is, on the other hand, very materially affected by changes in income and style. The standard of the present is the basis of calculation as to the standard to be maintained in the future, and so during retirement.

(c) While accident and retirement constitute objects of economy more or less definitely measurable and in the main definitely limited, the desire of being better off is essentially indefinite and capable of almost unrestricted expansion.

(d) In many instances saving which makes possible the satisfaction of this wish to be better off so far from diminishing the wants anticipated in the future, increases them by opening the door to new areas of ambition and desire. Fresh possibilities are realised and further motives for present economy provided by the belief newly felt, that more ease can be achieved than was once dreamed of. Not only are new kingdoms espied, but the idea of their conquest entertained.

(e) In certain cases, as where provision against illness or accident, means for retirement, or, indeed, the satisfaction of some definite desire which unless satisfied wholly is not satisfied at all, form the objects of saving, the possibility of complete provision is a condition of saving. Inadequacy of means for this purpose makes men unwilling to save. Insufficient insurance is no insurance at all.

(f) A rise in present means entails a rise in many

of the calculations of future needs, and a fall similarly entails a fall.

(g) Estimates of future as compared with present means vary with the age at which they are formed. Taking all ages together, there seems to be no ground for assuming that the general estimate as to future income is sanguine, provided, of course, that all question of interest arising from previous savings be put aside.

(h) Saving means the postponement of a given amount of means whereby for a present satisfaction, holding a particular position in the scale of utility, there is substituted a future satisfaction, often more urgent in its nature, but always more distant in time.

## CHAPTER IV

### INTEREST

IN the consideration of interest there are three questions of primary importance: the circumstances determining the rate of interest, its position as necessary or otherwise, and lastly, the effect of its payment. The first two of these will occupy our attention for the present.

The immediate determination of interest at any given time must be carefully distinguished on the one hand from the circumstances which provide a fund out of which it can be paid, and on the other hand from those other circumstances which lead those who postpone their enjoyment to demand a larger sum of the material means of gratification in return for the smaller sum which they delay to consume. As distinct from those, it rests on the connection between the demand and supply of capital, their interaction and mutual influence, and any relation between it and such consists in the effect which they may have respectively on demand and supply as separate factors. Thus the profitable employment of capital in industry at once provides a fund out of which interest can be paid, and conditions the demand for capital on the part of those who use it; but it is only in this latter

aspect that it affects the rate of interest. Similarly with regard to the provision of capital through postponement, while the possible need for some compensation or make-weight for the deferment of consumption will require subsequent notice in itself, its more immediate importance is concerned with its effect on the supply of capital. But before even these matters can be touched, the actual determination of the rate of interest requires attention. That rests, as has been said, both on the circumstances of supply and on those of demand for the power of waiting. The rate of interest is that rate which, given existing circumstances amongst which the standard of living and wages is included, effectually distributes the amount of capital present among those who can use it to the best, or what appears to be the best, advantage. In other words, as long as the capital is limited in amount, as of course it is at any given moment, those will be able to obtain it for use who offer the most for it. Like buyers of commodities, the users of capital will be supplied in the order of price. Those who offer high prices, whether they can judiciously afford them or not, will, granted the possession of credit, be supplied first, and after them come those whose demands are couched in decreasingly urgent terms. This is wholly independent of any ulterior effect which the price or rate in the respective cases may exert upon future supply and demand. Further, it is unaffected by the possible willingness on the part of all, or some of those, who possess capital to lend it out on terms less favourable to themselves. Such willingness in the case of either the sale of commodities or the loan of capital, practically the sale of present things, will not prevent the price or rate

being forced up until capital is distributed among those who can offer the most. Till such a distribution is effected equilibrium cannot be attained, since among those who want capital and are unsatisfied are some who can pay more for its use than those who have obtained it. Of course should wages rise and a higher standard of living be adopted, the amount offered in interest all round will be affected; but pending such rise, it may well be that what might go or have gone to wages, will be absorbed in the rate of interest. The willingness of possessors to take a lower rate will not deter them from accepting the higher if only they be given the chance. In one aspect the case is that of a commodity the supply of which does not respond with elasticity to alterations in price. Given such a commodity, price is obviously determined by the demand. Granted like conditions in the case of capital, the rate of interest may be higher than that required by those whose postponement leads to its existence. The relation between interest as a rate and supply is a matter for later consideration.

The effect of the productive use of capital upon the demand for it is simple. They stand related as aim and action, and yet allowance must be made in one particular. Though in most cases, and so far as existing conditions are concerned in nearly all cases, the possibility of profit arising from productive use is the motive underlying demand, cases exist where capital or rather accumulated wealth is sought not for production but simply for consumption use. At the present time these play an insignificant part in the total, but in earlier ages they were of much greater importance. As is fully recognised, this

difference of motive and condition distinguishes mediæval and modern conceptions of the justifiability of interest. Productive employment, however, so far as its own nature is concerned, is quite immaterial in respect of the problem presented by the consideration of supply and demand. In this relation its importance consists not in the fact that production is encouraged and the country benefited, but in the permanent character thus acquired by the demand for capital and the provision of a fund out of which regular interest becomes possible. The rate of interest is affected indirectly and through the medium of these; its determination resting on the interaction of the forces of demand and supply as described above.

Again, the connection between the rate of interest thus determined and the rate which according to hypothesis is necessary to induce the postponement of consumption consists in the provision by the latter of a minimum limit below which the former cannot fall. The real matter of importance, that is the question of the need of any such makeweight, will be discussed below; but assuming its existence, it is obvious that the rate offered must be equal at any rate to this. The same may be said of the contention that interest is needed to retain individual capital in productive employment and to prevent its restriction to a stationary amount. Higher it may rise, lower it cannot sink. Such a makeweight, if necessary, limits the field from which saving is made and capital can arise.

Much greater difficulty attends the consideration of the relation between interest and the initial supply

of capital. From what has been said, it might seem as though the difference between an act of consumption in the present and the same in the future would involve some addition to the sum put aside for postponement to secure anything like equality and a considerable addition to induce actual postponement. It is undoubtedly true that, granted that the consumption of the same sum at different periods imply equal satisfaction, some such addition is required in order to assure an equality in the eyes of those who view the matter from the standpoint of one of these two dates, that is, from the present. If the man in the present feels that his schedule of wants in the future will correspond with that of the present, and likewise that his means of satisfying them will be identical, he will naturally prefer to expend any further and new sum of wealth on present rather than on future satisfaction. Here the choice lies between satisfactions in the same place in the scale but differing in the time at which they are to be experienced, the one immediate and the other more distant. So far as this goes, the necessity for some compensation for deferment is obvious. Compensation is sought in an addition to the sum of wealth, and so of satisfactions sufficient to outweigh the diminution in anticipated utility when consumption is transferred from the present to the future. Its use is to magnify a distant object. More truly, it means an addition to the actual magnitude of the distant object sufficiently great to make it seem as large as, or even larger than, the near object to one who views both from the standpoint of the present.

With a change in conditions the equality thus

assumed between the satisfactions arising from the consumption of equal amounts of wealth in the present and in the future vanishes. The amount of satisfaction derived in consumption depends on the keenness of the want thus satisfied, as well as on the amount of wealth expended in its satisfaction ; and the application of the given sum to the satisfaction of wants occupying different places in the general scale of desire will result in satisfactions radically different. Thus, taking saving as proceeding increment by increment, each successive increment postponed involves a greater deprivation in the present and a smaller anticipation in the future. The present and potential utility increases, and the future utility, as anticipated by the man who postpones at the time when he postpones, diminishes. In other words, the satisfactions to be gained by the expenditure of £100 differ in the cases of men owning incomes of respectively £300 and £700, or with the same man at two different periods of his life when he has respective incomes of £300 and £700. An additional £100 means much more at one time than at the other. But if we turn back to the consideration of the objects of saving, those comprised in the great group conditioned by the desire of not being worse off in the future than at the present, offer instances of such cases. Either new wants, and those more urgent and ranking higher than those capable of immediate satisfaction, are added to the wants already felt, or dreaded deficiency in means threatens to leave unsatisfied in the future wants which are now satisfied, and which rank above those which would be satisfied were wealth not postponed.

In each case the given sum if expended in the future will produce utilities greater than those which would ensue on its employment for the purposes of present consumption. Whether such differences are in particular instances sufficient to counteract the gradual discount of distance depends on the case in question, and is a matter of detail. They operate in that direction. In many cases they are so great that the difference of time is of little moment by the side of the grave apprehensions thus entertained of possible need and anticipated decrease in income. So far, then, as saving performed in view of the uncertain risks of the future and of the probable decrease in earnings is concerned, a makeweight is not an indispensable feature, or, in other words, interest is no necessary condition. Saving, however, which takes place to permit of greater luxury, cannot be treated as above. The transfer of the consumption of wealth from the present to the future, while conditions as to wants and means remain the same, requires something to put against the effect of distance. In some few instances, the desire to consume all at once what has been saved by driblets, and the greater satisfaction thus offered by simultaneous consumption over the total added satisfactions, may make saving independent of addition or interest, but cases such as these are few. In the main, saving under the influence of this general desire is the exchange of a sum of wealth for one that is larger, and that involves interest.

Other grounds for interest require consideration as compared with the foregoing. One such cause has been sought in the conditions of a progressive country,

where it is said each unit of productive force becomes more productive. Under these circumstances, it is urged that a given sum represents less in the future than in the present by reason of the larger sums and income with which it is compared. So far as equity is concerned this no doubt is true, but it is a little difficult to see how the parties concerned in the exchange of present goods for future goods will be influenced. It is doubtful if it will enter in any way into the calculations of those who are hesitating as to postponement. They will be prevented from realising this particular depreciation of the sum which they defer and which they expect to receive back by want of experience, and because the loss after all is comparative and not absolute. It is due to the existence of novel satisfactions in the future which neither exist in the present nor can form part of the anticipations which may affect their estimate of the future. Such grounds do not then make interest indispensable to the act of saving. The rate of interest may indeed be affected, not directly by this prospect of general increase in income, but by that which makes this possible—the progressive condition of the country and its rise in productive efficiency; facts readily appreciated by those who make the future offer for the right of appropriating the fruits of present labour, that is, the industrial leaders of the time. Their demand for new capital will result in a new rise in the rate of interest in order to stimulate postponement on the part of those whose savings are determined by the prospect of increase. Such are those whose objects fall into the latter of the groups mentioned above,

But the same condition and prospects have given rise to another line of argument. Saving, it is urged, is one of the factors which render this new productive efficiency possible, and so it may be said that capital which is produced at one cost enables its own reproduction and so return at a lower cost. The cost of reproduction is less than the original cost, because it can avail itself of the new instruments in which capital has embodied itself. An analysis of the example chosen by Bastiat of the results ensuing from the invention of the plane will show what is meant.

"There is a certain man engaged in making planks. Working hard with such tools as he has, he finds that he can manufacture those planks at the rate of three a day; but if he had a plane he could double the amount of planks which he could make in the day. Therefore he determines to make a plane. This task, we will suppose, will take him four weeks. Now the question which presents itself to his mind is as to how he is to live during those four weeks. Up to the present he has been occupied in making planks, exchanging them for food and other necessaries, and thus living, as it were, off the immediate product of his toil. But he finds that by a certain effort of self-denial he can live on less than has been his custom. He can reduce his expenditure from a rate of three to that of two planks a day. It will then be incumbent on him to practise such abstinence until he has accumulated sufficient wealth to support him at the rate of two planks a day for four weeks. In order to do this, he must for the eight weeks preceding the commencement of his new tasks practise self-denial.

For twelve weeks he will go on short commons, but at the end of that time the plane will be ready for use, and he can now make six instead of three planks a day. Now let us suppose that he wishes to make another plane. The time required for the manufacture of the plane may still be four weeks, but how long will it take him to accumulate the necessary store of food on which to live during that four weeks at the rate of two planks a day? In his new circumstances he will be able to save four planks a day instead of one, and thus in place of having to practise self-denial for eight weeks, he will only have to do so for two weeks previous to commencing his task of plane-making. His total period of abstinence will be one of six weeks instead of twelve."

Other cases closely resembling the above occur in which capital facilitates very directly its own reproduction.

The considerations involved in this instance as those of the corresponding case where the man who postpones receives a return identical in amount but less in its comparative value, indicate very clearly the essential lack of equality between a given sum in the present and the same sum in the future in a progressive state. The like would hold good for a country declining in its powers and prosperity, though there the accumulation of wealth is conspicuous by its absence. In such cases, unless there be an alteration in the material sum returned, one party to the bargain will gain unduly. In the instance of the progressive country the gain would accrue to the future, while the present would lose. With regard to such considerations, it must be noticed that they are

not involved in the replacement of the large mass of capital, which does not take place under progressively improving conditions. Capital will be required in stationary conditions where production, reproduction, and replacement ensue the one upon the other without alteration in the general efficiency. The great mass of capital is applied in industry not by way of improvement of existing conditions but to prevent their deterioration. Even in the instance of the plane, though a true difference separates the production of the second from that of the first plane, no difference exists as between the second and the third, and so on. Taking particular cases, an addition to the sum returned while of significance in the first replacement would be destitute of real meaning in subsequent replacements. But it will be said that in a progressive community the capital placed at the disposal of the industries of the country will be an increasing amount, and that some part, the marginal part in fact, will demand replacement with an addition. Moreover, the payment of such a supplement in part will involve its payment on all. The homogeneity of capital is such that all those who postpone may be regarded as potentially postponing the last increment, and therefore equally entitled to any supplement returned by way of addition. This, of course, only applies to cases where general cheapness or improvement is the result. But in such cases an addition to the main sum, which might be substantial in the case of the portion in virtue of which it occurs, will be slight when distributed over the whole mass of capital. Again, the direct result of the increase of capital use in many cases is to substitute new processes for old

processes in which much of the existing capital is vested. Finally, the effect of such a change on the rate of interest, if we take that as the addition, will be by way of a keener demand for capital. Supply will not be directly affected. So far as the mind of the man who already postpones is concerned, the possibility either of a comparatively less sum being returned or of the future producer being disproportionately benefited are without effect. His estimate of the future and the present will not be touched. On the other hand, the offer of an addition, of interest or more interest, will not be without its effect in stimulating saving among those who save because saving becomes for the first time worth while. In other words, the new capital produced and applied in view of these novel possibilities, and with these prospects of addition when replacement takes place, is produced in view of this, and demands this as its essential condition. But if they receive it, all will demand it. As the rain falls alike on the sea and the thirsty land, so interest will accrue alike to those who but for it would not save and those whose saving proceeds without any such requirement. Each new increment of saving is induced by a higher incentive, which once given raises the rate of remuneration for capital throughout.

Given the amount of postponement that takes place, the demand for some addition by way of incentive is undisturbed by its productive employment as capital, for it depends on an estimate between the present and the future which does not take into account either the comparative decrease in the sum by reason of a general rise in income, or the greater

advantage to those future producers whose replacement of capital will take place at a lower cost than was incurred in its original production.

On the other hand, these considerations, though not initially affecting those who save, and so forming no direct part of the motives primarily involved in postponement, are of importance in two respects. They obviously affect those seeking for capital, and thus lead to a higher offer for its use. The effect of this offer upon the supply of capital and the postponement of wealth needs careful consideration.

Again, interest must be considered as the check imposed on those saving, who but for its payment would desire to consume their capital sum and thus, as some hold, occasion a decrease in the productive capital at the disposal of society. Its influence and importance in this particular though rather restricted aspect must be separately treated.

For the present it will be assumed that some rate of interest is given, and that postponement or saving in general takes place in view of such interest.

## CHAPTER V

### INTEREST AS A GENERAL INCENTIVE TO POSTPONEMENT FOR FUTURE CONSUMPTION

INTEREST, as has been observed already, does not stand in any uniform relation to saving as an act. Its importance, indeed, varies with the aims in view of which saving is undertaken, that is, with the motives which seek their gratification in this way. An inducement to postpone it undoubtedly is in certain conditions and with certain people, while further, an increase in the rate of interest in a like way tends to stimulate fresh acts of postponement. But here we must stop. It is neither an invariable nor a constant motive.

Here, however, two points of importance present themselves.

In the first place, it must be remembered that the rate required and offered for the last increment of wealth deferred and of capital attained must be given for each increment, in the same way as the price of a commodity is determined by the price of the portion last produced and last offered for sale. No doubt, with capital, specialisation prevents this from being true of all capital present at any one time in a literal sense, though it is singularly true

of free capital by reason of its great homogeneity, and in the case of capital already embodied in some form, a change in the rate of interest is given its effect by an alteration in the market value of the capital itself. Interest changes, and with its alteration the value of invested capital varies. The marginal rate, then, is the rate which will be required on all capital. This implies a species of rent, postponers' rent. As there is consumers' rent and producers' rent, so too there is postponers' rent. Now, entirely apart from any general question of expediency or justice, this is of moment as indicating the difference between the rate of interest demanded, as the condition of a particular act of postponement, and that offered. There is nothing to force these two into close relations, though some would harmonise them by stating their identity in the case of the last increment produced. In a sense, even this is open to criticism as will be seen later on; but accepting it for the time, the difference in other cases between the rate required and that received remains unaffected. The effect of such a surplus payment is an important matter for discussion.

In the second place, the homogeneity and general likeness between interest and capital, so far as use by those who save is concerned, is freely admitted. In most instances interest can be substituted for capital, the main aim of postponement being to secure provision for the general and continuous expenses of life in the future. Exceptions, it is true, exist. Provision against accident and illness involves a capital which can, if required and at any rate in the last resort, be used not as the source of wealth, but as wealth itself.

Even in respect of general wants the possibility of such conversion enters into the view, though possibly obscured by the idea of income as represented in interest. Still, when all due allowance is made for special cases, interest can in the main be substituted for capital, and an increase of interest tends towards the possible displacement of capital. On the other hand, it must be remembered that capital cannot while it remains capital be a fund capable of satisfying direct personal needs. Any conversion into a form suited to such purpose, granted that conversion be possible, diminishes the store of capital as a productive force.

Before proceeding to consider the exchange of present and future goods in the light of what has been said, it is well to recall the conclusions stated before with regard to the nature of the motives and objects of saving.

These fall into two great groups, in the first of which are placed those motives of saving united by the common desire to secure the future from any fall below existing standards of comfort; in the second, those which, in response to the general desire for greater wealth, are inspired by the hope of being better off, an object transferred by the force of circumstances to the future for satisfaction. In the first group are many savings very different in character, some arising from apprehension as to new needs, others from the prospective decline in income; but in all cases their extent is subject to limitation either by being more or less fixed, or through future needs being dependent on those of the present, in which case the present standard determines that of

the future. An alteration in the range of present satisfaction will consequently affect the estimate formed as to the future. But in the second group there are no limitations of this kind. The desire for greater wealth, comfort, and luxury holds sway, and, as has been said already, its satisfaction in the future rather than the present is an incident and not an essential part of its nature.

The discussion of interest in the preceding chapter resulted much as follows. Like price in the case of commodities, the rate of interest is determined by the relations of supply and demand, and is such that the total quantity produced is distributed among those best able to pay for it. Furthermore, an excess of the rate offered may evoke a supply from novel sources by making postponement remunerative where otherwise it would seem a loss and mistake. Of course the obvious fact that a great part of the saving takes place in view of other objects than interest, suggests that a large amount of the interest paid is purely unnecessary. But the main difficulty remains untouched. The foregoing argument has generally assumed that a rise in the rate, as settled for purposes of distribution and as determined by the conditions of the country, leads to an increase in the total amount of the capital, or, in other words, that a rise in interest will call forth new supplies of capital. This requires consideration.

The exchange of present for future goods takes place under somewhat confused conditions, which must be carefully distinguished. To do this necessitates its consideration, first in its simplest form, then in a somewhat more complicated form, and finally amid

the play of the various motives which present themselves in real life. The first form of an exchange of present for future goods rests on the hypothesis that no use is made of capital, that, in other words, the motives influencing both those who postpone and those who anticipate, those who offer present for future goods, and those who offer future goods, or promise them, for present goods, are uniformly the same. They are preferences of the same kind as those manifest in any ordinary exchange, where goods of one kind are offered and exchanged for goods of another kind. The use of such goods in production or otherwise is ignored. If this be done, and if in addition the promise of future goods be regarded as relieved from any uncertainty, there is a close analogy between the two kinds of exchange. In each case the respective utilities of the goods involved determine the rate. The man who offers the present goods and the man who seeks them by the counter-offer of future goods are influenced merely by the effect which the change in the date of consumption has in determining the use of each of the goods in question. One man offers his surplus stock of perishable food for the same food in the future, and another who sees no difficulty in obtaining food in the future promises a portion of that in return for a present supply. The part which the present supply may play in facilitating the production of the future does not enter into the calculation. Under these conditions, some addition to the quantity offered in the future for the quantity offered in the present may be present in many bargains, but it cannot be offered regularly or with security of payment.

The possibility of such regular addition to the amount given in the future for the present amount depends on the element hitherto ignored, the possibility and the intention of the employment of the present wealth as capital, or, in other words, as a means of facilitating production. The demand for present goods is not merely the demand of those who on general terms prefer the present to the future, but the demand of those who without such present goods to aid them see their future rate of production diminished and their powers crippled. The modern opportunities for using present wealth as capital are so vast that the rate of interest, so far as it rests on demand, is mainly determined by those who wish to seize them, as distinct from those who merely desire present wealth for consumption. With their growth the offer of interest becomes normal instead of abnormal; and the demand for wealth as capital is placed against the demand for future wealth, not as capital, but as the means of satisfying future wants. The motives affecting those who demand present goods, offering a return in the future, and those who supply the present goods and require a return in the future are no longer uniform. The former are influenced by considerations of capital, the latter seek not capital but wealth. To them the capital employment of what they surrender is an incident, as indeed is the capitalistic production of the wealth they seek in return for their postponed enjoyment.

The commodities really in question in determining the rate of interest, consist of the present goods offered and demanded. To put the matter more accurately, some are willing to deflect their efforts, or the efforts

due to the satisfaction of their wants, from the production of present goods into the production of future goods in return for something in the future. On the other hand, there are some desirous of employing such effort in processes of capital, which will increase their future income, and which will thus enable them to offer larger quantities of future goods than the present goods would amount to, were these produced immediately with the efforts thus deflected. This increased power and so increased offer of future goods is the inevitable incident of capital employment. Those surrendering the claim to present goods are swayed by the desire to obtain the material means of meeting future wants, and determine on the postponement of gratification when the future satisfaction they anticipate is as great as, or greater than, that which they forego. On the other hand, those who use the present do so because it increases their power in the future. The motives of the two classes relate to different aspects of wealth ; the one viewing wealth as a means of gratifying wants, the other as a means of increasing production. An instance shows the difference. An increase in the field for the investment of capital quickens the demand for the capital use of present effort without affecting the motives of those who supply. They do not demand any larger return in the future in consequence of it. The rate of interest rises. But here recurs the question previously raised as to the effect of such a rate in equalising supply with demand. Does each rise bring forth an increased supply ?

For the time such resilience may be assumed. By present hypothesis it is assumed that further incre-

ments of postponement, and so of wealth to be used as capital, are forthcoming in response to rises in the proportion in which future goods are offered in return for those which are present. But this matter aside, a curious position presents itself.

The very rise which by assumption encourages further postponement on the part of some, discourages those, or some of those, already postponing from some part of the postponement, which before it they were willing to make. They postpone when the utility of the future goods is greater than that of the present, and the marginal increment of postponement occurs under circumstances which means that this excess in the utility of the future is so small that further deductions from present goods and additions to future goods would involve a loss in total utility. But interest is an addition to future goods and so will check postponement which otherwise would take place.

Pursuing the analogy of an ordinary act of exchange between the holders of goods of different kinds, the case may be stated as follows:—the holder of the first commodity stays his exchange at the point where the utility consequent on the acquisition of a further increment of the second commodity will be less than the utility sacrificed in attaining it at the cost of another increment of the first commodity. On the other hand, the holder of the second commodity stays his exchange when the utility of another increment of the first commodity will be less than that involved in the surrender of another increment of the second commodity. Substitute for the first commodity, present goods or the claim over them, and for the

second commodity, future goods. Several curious features present themselves. In the first place, the amount of the second commodity producible by the second holder depends on his possession and use of the first commodity, a use which may vary in its efficiency from time to time. In the second place, the amount of the second commodity, and so the utility of its further increment to the first holder, bears in cases of the first group some relation to the amount of the first commodity, which he possesses, that is, the demand for future goods is proportioned, while other things are unaltered, to his possession of present goods. In certain cases it is a more or less fixed quantity independent of this. In the third place, we must ask what certainty there is that that particular rate of interest which is such that the quantity of present capital goods is distributed naturally and in equilibrium among those requiring them is also the only rate able to bring about equality between the goods in the future and those given for them in the present.

The first point is simple, and hardly calls for comment save in explanation of the continued possibility of interest itself.

More varying elements enter into the consideration of the second matter. Changes may occur affecting the relations of goods for present consumption and goods for future consumption. The utility or power of gratification of future goods may increase relatively in two ways and similarly decrease. To take the former case. This may take place through increase in the intensity of want felt, or rather anticipated, in the future. Such an increase will lead obviously to further postponement, till the utility of the last

increment of future goods will approximate to the utility of the last increment of present goods. The quantity of capital goods will be greater and so the rate of interest will fall. But the change may take place in another way. Present goods postponed and kept to the future may undergo a shrinkage in quantity, with the results that wants hitherto met will be unsatisfied, and so demand will call for further postponement. A shrinkage implies that the rate of interest has fallen because future goods consist of the reproduction of the present goods together with interest. Here the result will be as before—an increased transfer of effort from the production of present goods to the production of future goods. This increased transfer involves an increase in the quantity of capital. The transfer of energy will not proceed to its farthest extent, since each diminution in present income occasioned in its course will diminish the amount required in the future, so far as that varies in proportion to the standard of the present. On the other hand, the intensity of future needs may decrease and cause a fall in willingness to postpone and a rise in interest. Lastly, if with the same division of effort between the present and the future there be an increase in the total future goods by reason of interest paid to those who postpone, a transfer of effort from future to present production will ensue; but a transfer in itself increases the standard for the present and so generates a check on its own progress.

Two things must be noted. Firstly, future goods and present goods are produced at the expense of each other, energy or productive power being transferred from the production of the one to that of the other.

Secondly, when the wants of the two periods stand in a due relation, the anticipated needs of the future being estimated according to the standard of the present, such transfers tend to generate restraints in their full development. In certain cases placed in the first group, the needs of the future are even more rigidly defined, as with risks of accident and illness where, though the nature of the satisfaction may vary slightly with the general scale of living, its variations are not complete, while the actual number of risks does not vary at all. When this is so, alterations due to the rise and fall of interest, as will be seen, are more accentuated than where saving takes place on behalf of wants proportioned to those of the present.

Of the foregoing instances the most important here are those which affect the third point raised above. In this case the change which takes place, and which is the cause of future alterations, lies in the quantity of future goods presented for consumption, that is, the change in the rate of interest. Its influence on the accumulation of wealth and so on the amount of capital is under inquiry. The circumstances attending such changes may be restated and examined from a slightly different point of view.

Let us take the case of a community which has at its disposal a certain amount of productive force, with which it produces two commodities, one of which only,  $a$ , is used for immediate consumption, the other,  $b$ , requiring an interval during which it comes to maturity and becomes fit for consumption. So far as consumption and demand for consumption are concerned, the mature form  $\beta$  is the one which matters. Then the productive force of the country will be so distributed between the two commodities  $a$  and  $b$ , that the return

to the marginal increments of the force in both directions may be equal. A further expenditure of an infinitesimal unit of force, newly introduced, would be indifferently directed towards the production of either. Owing to changes in the maturing process,  $b$  increases as it develops into  $\beta$ . But such an increase in the amount of  $\beta$  will diminish its utility when the demand for  $\beta$  is either fixed in quantity or restricted by the amount of  $a$ , and so bring about a transfer of some part of the force hitherto employed in that direction to the production of  $a$ . More of  $a$  and less of  $\beta$  will be produced. The parable may be applied. The community is producing commodities for present and future use, that is, present and future goods; and the division of its force between the two depends on its estimate of the utility of present goods as compared with that anticipated from goods in the future. A rise in interest means a rise in future income; and so far as the future needs are either fixed or proportioned to those of the present, such a rise will almost inevitably occasion a diminution of the rate of accumulation and an increase in present consumption, this latter increase bringing with it in the course of its rise a new demand for a larger future income. It will consequently be checked somewhat short of its full development, and equilibrium will be once more established. In this new state of things there will be an actually smaller amount of wealth postponed. But this is only correct in so far as, firstly, the changes in the rate of interest are not due to a general rise in productive force affecting equally the production of present and of future goods; secondly, the objects in view of which saving takes place are limited either in

some fixed quantity or by a close relation to the present standard.

In the first place, the rise in interest, if due to some change by invention or discovery applicable to the whole range of production, will be speedily followed by an increase in the production of goods, present as well as future. The rise in both directions will be similar, and the demand for future goods will continue related to that for present goods in the same proportions as before. The rise in interest will be but part of a general rise in remuneration by interest, wages, and profits. The increase in productive efficiency takes place not in the so-called maturing process, but in general productive efficiency, and the larger income of the present will be offset by the larger income of the future. In such a case, indeed, it would seem probable that the absolute amount of accumulated wealth or capital will increase, since with the general increase of wealth the amount of accumulated wealth, as accumulated wealth and not as income-producing capital, formerly adequate, will no longer seem adequate to the needs of the time. But this is an indirect and not a direct result, and arises from the fact that in certain cases interest and income are not a full substitute for the capital sum. In other words, a new want for the future comes into existence. This may lead in time to a fall in the rate of interest itself.

In the second place, the extent to which a correspondence exists between future and present income comes into question. It has been pointed out that in the case of those motives of saving grouped together in the first group in the preceding pages, such correspondence exists save where it is, as it were, forestalled

by a more rigid limit on future wants by their remaining a more or less fixed quantity. Some such correspondence is to be expected. A man determining the best distribution of his powers between present and future gratification, looks actually at the needs which he satisfies now, and then at those which he anticipates as requiring satisfaction in the future. His habit of life unconsciously as well as consciously conditions the future. The matter at issue, however, is not the existence of such correspondence, but its extent and degree.

It is one truth, but there are other truths which enter into and aid in determining the postponement of enjoyments. Firstly, the motives in the second large group call for consideration, for here we have aims which evade limits such as those considered above. They unite in a desire for a more liberal and extended standard of living than is enjoyed, or can be enjoyed, at present. Secondly, there are certain satisfactions which cannot be enjoyed partially, but must be enjoyed fully or not at all. Certain wants are such, that their gratification involves not any partial satisfaction by the postponement of increments from the present to the future, but a satisfaction entire and complete by postponement of sufficient increments. Short of such complete satisfaction or its prospect, the want will normally be left unsatisfied.

The first of these matters is perceptible in certain forms in the exchange of present commodities. An individual with a given income divides his expenditure between two commodities. Should a change occur in the conditions of production of one of these by invention or new dexterity, it may well be that the

continued employment of the power hitherto used in this direction would lead to over-production of the article in question. Should the choice still lie between the two commodities, it is possible that some effort may be diverted to the production of the other commodity; but the desires of man are not apt to be so restricted, and with satisfaction achieved in these directions, efforts may turn towards new wants hitherto ungratified by reason of inadequate means and the more primary and so more urgent character of the demands met by the commodities first produced. It may be that these will remain as they are, and that the only change will be the application of the excess power to the provision of further and new gratifications. This will doubtless be the first effect, but in two respects a further distribution of labour may be occasioned. On the one hand, the new want may be one that cannot be satisfied by the amount of labour or income thus in excess, for instance, a continental trip. This introduces a matter to be discussed under our second heading. On the other hand, the new want once gratified may be felt so intensely that those who experience it will rather curtail their expenditure in other and earlier directions than leave it so little satisfied as otherwise it must be. In both cases a sacrifice of former enjoyment will be undergone in view of the greater gratification to be obtained.

The second point has been touched on. A continental trip, a carriage, a horse, are enjoyments which cannot be gratified by small increments. A tenth part of a horse is useless, and a whole horse with its keep or no horse are the alternatives. The same holds good with a large variety of wants

and their respective commodity gratifications in the present. It is still more potent in the case of comparison between the present and the future.

Hitherto these two restrictive influences have been treated of with reference to the exchange of commodities existing as it were in the present, but the effects perceptible even in these circumstances are more clearly seen, and they themselves are much more powerful, when the exchange is no longer between commodities and wants contemporary but between those of the present and those of the future. In the case of the first, the desire to be *better off* and not merely *not worse off* in the future is a great motive in governing postponement. The place of this motive is adequately recognised so far as the ordinary course of saving and postponement is concerned. It is less fully recognised in dealing with the influence of a rise in the rate of interest. With some people and under some circumstances the rise of interest offers an opportunity of being better off, or of substituting luxury for comfort, or comfort for bare subsistence. To attain such fuller material life, a present bare livelihood, a livelihood that is even barer than formerly, will be undergone. In other words, a rise in the rate of interest opens for the first time a vista of opportunity to the gaze. Without such rise more comfort for the present and provision for the future on a like scale to the present is the rational solution. But with such a rise the new possibilities of an ample future are the spur to novel present economies. The choice is not between an ample present life and an ample future life. Luxury and ease if to be enjoyed at all, are to be enjoyed in the future. Again, as between the present and the

future, the basis is continually shifting; further increase in needs is not necessarily an increase in needs of like character, but often a transfer into a new class of requirements. Provision for them in consequence involves provision for successive groups, and at any time a rise in interest may make it possible for a man to recommence postponement and to save against an entirely new set of wants. Some weight must be attached to these considerations as counteracting, at least in some measure, the restrictive effects of a rise in interest.

Alterations in interest operate in different and even opposite directions according to the particular motives which stimulate and determine postponement of satisfaction in particular cases, and the distinction of these motives or objects of saving, as previously attempted, enables a qualitative though not, it is true, a quantitative decision as to their effect. When the object of postponement or saving is provision against certain contingencies, the amount required is not liable to indefinite extension, and is not even necessarily proportioned to the present income of satisfaction or means of living. Changes in this latter respect though they may influence it, do not occasion an alteration proportionate to their own extent. Again, when the objects are concerned in the main with the future means required when the present powers of earning have decayed, there is, as we have seen, an obvious correspondence between the present style of life and the amount anticipated, and demanded in the future. The means sought for the future are limited by those enjoyed in the present. But the motives, summed up under the general desire of being *better off*, are indefinite

and unrestricted by consideration of present satisfaction. Like desire in general they grow with the opportunity of satisfaction, and increase of income often augments rather than diminishes the desire for wealth. That the desire is for future wealth is incidental, and a necessity which arises from the circumstances under which these wants are felt and their satisfaction is possible. Further, there is a marked tendency to cut life into two parts—that devoted to work and that appropriated to leisure, comfort, and luxury; that during which postponement or saving is practised, and that in which its fruits are enjoyed.

Again, as has been seen, the analysis of the early motives governing accumulation and capitalisation discloses two alternative courses open to those whose whole efforts are not directed to the satisfaction of their immediate wants. Some accumulate a store or reserve against the needs of the future; others employ their energies in contriving aids to their labour which will vastly increase their productive powers. To some extent the motives governing these different classes are different. The former are swayed largely, if not wholly, by conceptions of the future based on their present mode of life; at any rate it is true that their view of their need in the future is limited by their present standard of life and of contingencies and accidents which may occur. But of the latter this does not seem to be true. Wealth and a fuller standard of material comfort is their object. Before them is placed an object more unlimited and less capable of restrictive computation than that which looms before the others. In modern societies, the separation in action between these two forms of

postponement has vanished. Formerly, to save as a reserve excluded capital use, and capital use excluded it. Now they involve each other. Those who save a reserve save by means of capital use, and the amount of capital, *granted average circumstances*, indicates the amount of the reserve. But it is a mistake to assume that the desire for greater wealth, once the motive to capitalisation, has ceased, and that all accumulation takes place through the incentive leading men to form a reserve against accident and comparative need. Wealth is an object; and future wealth when only in the future is such wealth possible, will compensate and inspire present denial and postponement. A rise in interest holds out a prospect oftentimes till then uncontemplated. This acquires more importance in connection with the second point raised above. There it was pointed out that as far as many of the wants of the future are concerned, the alternative is not between satisfying them more or less, but satisfying them adequately or not at all. No doubt the same is true occasionally in the exchange of commodities; but with respect to the future its applicability is more frequent and its effect greater. This is particularly the case with provision against contingencies. Here security or fair security is demanded, and anything short of this is insufficient. To take the case of retirement. If a man cannot save sufficient to afford him a reasonable prospect of retirement, he will not improbably prefer to save a small sum against accident and then enjoy his present means, trusting that he will be able to continue working to the last, and recognising that should his strength fail, he will experience disaster a little sooner if he has not saved,

and a little later if he has. Reasonable provision he cannot make, and so he prefers a slightly greater risk and a certain enjoyment to a slightly less risk with the possibility of no enjoyment after all.

In cases subject to these influences an increased postponement may be looked for in response to a rise in interest, while a fall in the rate will operate in a reverse manner.

Some further remarks are called for with regard to that portion of society whose estimate of the future and its needs are based on the gratifications and income of the present, and whose postponement is the direct outcome of such correlative forces. In its case a rise or fall in the present rate of living entails a corresponding rise or fall in the rate anticipated and sought in the future. Alterations, however, in the present, though tending to be followed by alterations in the future, are often separated from such corresponding changes by a lapse of time. A rise in the rate of interest sets free some part of the saving hitherto endured in order to secure like provision for the future to that enjoyed in the present, with the result that the scale of the present rises. Were the correspondence close and immediate, there would still be further reaction owing to a rise in future needs. But future wants and the desired future provision are more fixed in given figures than that of the present. Accommodation to the altered scale of the present takes place, but gradually, and only by time and experience. Moreover, it must be remembered that, in the case of certain among the needs in view of which postponement proceeds, the amount required is fairly definite and certainly little affected by present changes. If, for

instance, the aim before postponement is a definite income of, let us say, £500 a year, and if owing to a rise in income, less wealth has to be saved and invested to produce this income, the amount thus set free probably will go into the satisfaction of present desires, occasioning little if any change in the immediate estimates as to future wants. The necessary income is too deeply rooted to be immediately disturbed. The effect of such comparative fixity emphasises the initial effect produced by a rise and fall of interest in cases such as the above.

To recapitulate. In certain cases the tendency of a rise in the rate of interest is to counteract, and of a fall to increase the postponement of wealth, and so the supply of capital. This development is further strengthened by the greater fixity of idea as to the amount of wealth acquired in the future. But for this inelasticity a rise or fall in interest due to general changes in productive efficiency would have little or no result. Where it prevails, changes due to this cause are brought into some degree of harmony with changes due to alterations affecting interest and capital alone. On the other hand, in other cases rises and falls in interest tend in a directly opposite direction. Thus a rise encourages some to postpone by making future enjoyment sufficiently great and alluring to overcome the inevitable discount of delay, while, again, new savings may be evoked from those previously held back from saving by inability to save enough.

Owing to difference in motive, and the effect of interest in diminishing the amount of saving necessary to the attainment of a definite object, alterations in the rate operate in different directions. But no positive

and universal determination is possible, for the forces are irregular and exist in no fixed relations. It is, however, clear that it is incorrect to say that at a given time there is only one rate of interest able to bring about a particular amount of accumulation. On the contrary, different rates may bring into being the same amount of accumulated wealth and capital. The rate, however, that will be the operative rate is that necessary to apportion the given quantity among those seeking it.

From the preceding discussions two salient facts stand out in clear relief. Interest, even if one incentive, is by no means alone as an object of saving. Furthermore, there is nothing to prevent interest as offered from being in excess of that required to produce the required postponement of wealth. With this latter point it will be well to begin. Were interest subject as wages are to a rise in the standard of living, and were it also the one and uniform object of postponement, an alteration in it *might* incite increments of saving at progressively increasing cost till a point of equilibrium would be attained; and even though it were but one among many incentives, if these others were constant a like result might be expected. That this is not so, is due to the different effects produced by alterations in interest on those who save owing to differences in their motives. As has been seen in the case of some, its increase or even its existence as an enlargement of capital diminishes the total amount saved, while others save or postpone more on this very account. Looked at from the point of view of these different classes, changes in interest operate in diametrically opposite ways. But if this be so, the

same total amount reached by postponement may be accumulated at different points of stable equilibrium; the falling off in saving which might occur in one direction being offset by the increase in another. Some will save less, others more, with the result that the total may remain unchanged. A rise in interest will not occasion an increase in postponement till the additional self-denial progressively involved brings this to a standstill; in the same way a fall will not be followed by a corresponding diminution in saving. But when this is so, what will be the rate of interest under the influence of which the total will be accumulated? This matter, which is full of importance to those who are partners with capital in industry and sharers in the national income, and so to the community itself, is determined by the relation between the supply and demand for the wealth thus saved, or in general terms the capital. The rate of interest will be that required to distribute the capital among those requiring it, however much that may be in excess of the rate necessary to stimulate the saving of this sum by its incentive.

The total amount thus paid under the name of interest to those who save or put aside from immediate consumption a given amount of wealth, is not determined so much by the amount saved as by the persons who save it. If the saving is due in certain proportions to certain motives, the total amount of interest will differ from that required in the case of a group otherwise constituted and actuated. In other words, the same function is performed, though by different individuals at different costs.

It has been pointed out above that with a society constituted in its existing form the community does

not possess any choice as to the rate at which its saving shall be undertaken, and so as to the total amount which shall be paid to those receiving interest, the rate, and so the amount and the individuals saving, being determined by the relation between the supply and demand of capital. But the total amount is of considerable importance, since on it depends in part the present incomes of those who live by earnings. A rise or fall in the total interest-income involves in itself a fall or rise in the earnings-income. Though any comment on the general aspects of changes in the latter would be out of place, their possible effects on saving demand definite attention. These are difficult to forecast when there is no change in the total income of the society, but only in the proportions in which it is divided among classes susceptible to different motives so far as postponement of consumption is concerned. The probable effect of a fall in interest and of a rise in earnings is a disproportionate increase in small incomes, which are mostly composed of earnings as compared with large incomes, into the composition of which interest itself enters to a much larger extent. It may further be taken as highly probable that the classes in receipt of small incomes are more influenced by motives of insurance and retirement, the objects classified together in the first group in a preceding chapter, than by the general ambition of being "better off." If these assumptions are correct, and that they seem probable may be admitted, the income of society out of which future postponement must take place will be more largely than before in the hands of those whose instincts of saving are not stimulated by a rise in interest or depressed by a fall. So far, indeed, the

ultimate tendency of a fall in interest is to increase, and of a rise in interest to repress future accumulation. This tendency or effect is, it must be remembered, subsequent to and entirely apart from that immediately due to a rise or fall in interest itself. As distinct from these, it is occasioned by the difference in the distribution of incomes which arises from interest having diminished and earnings having increased.

It is possible to go further and to question the necessity of interest at all as an incentive to saving. That this should be so is due to the possibility of postponed wealth being, as it were, an end in itself and its own reward, only in this case, of course, it must exist in goods capable of yielding the desired satisfaction; in other words, it must be converted into immediate out of capital goods. The wealth itself, if so converted, and the interest accruing from its use serve the same purpose by gratifying consumption to their respective amounts, a feature noticed before. This very feature, however, based as it is on the use by those who postpone of their capital in future use, distinguishes interest as a remuneration from wages; since it, unlike the latter, is not the sole embodiment in satisfactions of a service or, as some would say, an act of negative value. Doubtless, if there be a discrepancy between the satisfaction anticipated in the future and that which may be enjoyed in the present, interest may be regarded as its compensation; but the existence of such discrepancy must not be assumed as necessarily inherent in all postponement of wealth. This brings us anew to the conception and nature of interest which the considerations discussed in the preceding pages will enable

us to treat with more precision than was possible before.

Interest bears two aspects. In the first place, it must be regarded as a particular method of saving; in the second place, it constitutes an increase of what is saved, and so needs consideration as an incentive to such saving. In both cases, indeed, it may be said to affect postponement. This is so in the first case by the substitution of one for another method. From this first point of view, interest is important because it relieves those who save of the fear lest their saving should be exhausted. Those who save desire, it may be urged, a continuous and current fund, and so they postpone not in view of the future satisfaction which might be derived from the direct consumption of the wealth thus postponed, but in order to obtain the interest-income which arises from it through its loan to others. They postpone a given sum not in order to obtain that given sum, together with an increment, but to substitute for that given sum a yearly income unrestricted in time, and so capable of satisfying both the wants they may feel during their undefined tale of years and those which stretch beyond the limit of their own life in the needs of their family or of some national or philanthropic conception. Viewed as a particular method, interest affects saving in so far as it provides a greater sense of permanence to those who but for it would be discouraged from postponement by the continual apprehension that any fund of accumulation might prove insufficient.

In its second aspect it appears as the temptation to put off consumption because by postponement the means for gratifying desire will be greatly increased;

it has been represented by some as sacrifice or abstinence, but it is only present abstinence in view of greater future indulgence. The choice to be made is between a definite present sum or a future larger sum of enjoyments, comforts, and luxuries. If life were such that wants were unaltered and inalterable, the means of their satisfaction likewise unchanged, and time of enjoyment a matter of no account, a greater sum of money in the future would always induce, and would be the one thing which would induce, those about to spend a less sum to desist, the future  $a+x$  would secure the capitalisation of the present  $a$ . But the problem is not so simple. Needs exist as possibilities in the future which do not exist as realities and cannot exist as possibilities in the present; means may vary and so far as power of earning is concerned will inevitably decay with failing powers; and lastly, the time of consumption is of very vital concern. Differences in the two former, that is, in the requirements and means of the future as compared with those of the present, render the expenditure of a given sum in the two periods entirely different matters so far as enjoyment is concerned. In comparison, and so in its real meaning, a given sum varies with the income supplementing it and the needs which beset its possessor. In both respects, in the case of needs which in the future include risks as well as certainties, and in the case of means which after middle life tend to diminish with the large majority, a given sum often ranks higher in the scale of utility in the future than in the present. An inverse conclusion attends the consideration of differences in the time of consumption. A mistake in this instance sometimes occurs through

erroneous analogies between ordinary acts of exchange and that exchange between the present and the future which goes by the name of postponement or saving. In the exchange of two commodities greater facilities for the production of one, and hence its increase in quantity, result in its fall in the ratio, and so ultimately in the application of a smaller amount of labour or rather general effort to its production. But supposing that exchange were of like things for like things, that is, of a smaller amount of certain things for a larger amount of the same things, they would not hold good. Of course every rational being would prefer the larger to the smaller. But in the case of the future and the present, goods at once differ in time and are like or identical in kind. The future requires to be magnified to be seen as distinctly as the present; but future wants, so far as one group is concerned, are but part of a general desire for wealth, and so unlimited. Men may be tempted to postpone a present consumption in favour of a larger similar consumption offered in the future.

With the social acceptance of interest as a factor, a certain annual sum has been substituted as the equivalent of a given capital sum, and this annual and continuous income depends on the rate of interest and alters with it. Where this rises it too rises, with the result that the sacrifice of a certain amount of present enjoyment once requisite to procure a certain enjoyment in the future now yields more than this. As has been seen, this represses saving with some and encourages it with others. Whatever be the balance between these two classes, it is clear that less capital will be forthcoming than would have been the case

but for the fixed and proportionate future wants cherished by some. In other words, the community may suffer, either by paying more than is necessary for its capital or by obtaining less than it requires, for its interests are most closely allied with those engaged in production, and their interests are distinct from the interests affecting those who postpone, the one looking at the amount of capital, the other at the income it yields.

So far as saving is inspired by the desire to provide for risks or wants which exist in the future as distinct from the present, or to supply the place of an earnings-income which will tend to diminish, interest is no necessary condition to its prosecution, and the payment of interest tends to lessen the amount of wealth necessarily postponed. When we turn to saving, after the wants and means of the future are provided for upon the level of the present, a certain increment or rate of interest will possibly be required as a set off to the difference in the time of consumption. What this makeweight must be depends on the sense of futurity, that is, the intensity with which future satisfactions are realised. If this be great, the increment need be but small; if otherwise, it must be greater. But should the interest given be greater than this, the actual amount saved may be checked. In this case, saving then rather requires a certain definite and limited rate as a preliminary condition than varies in amount with alterations in the rate, increasing with its increase and diminishing with its decrease. In other words, the increase of interest does not necessarily bring about equilibrium by inducing additional postponement. There are, however, certain

cases in which such a connection as the latter exists, as already said. Increase of interest may stimulate further total accumulation by its guarantee of adequacy, and also by offering new opportunities and rousing new ambitions in the case of those whose saving is part of a general desire to be better off and to enjoy more comfort and greater luxury.

## CHAPTER VI

### INTEREST AND ITS EFFECT ON THE USE OF ACCUMULATIONS

IN the previous chapter, interest has been treated mainly, if not entirely, with regard to its effect on saving during the time when postponement takes place for some future end, so serving as an addition to the sum postponed. It remains to deal with its influence during the period of consumption ; when, that is, the future once anticipated has arrived, and when some of the satisfactions, once the object of anticipation, now present themselves for realisation. In this connection another aspect of interest requires notice. During the preceding discussion it has generally been assumed that those who save will, when the time for consumption comes, proceed to satisfy their ends in the readiest way. But the existence of interest introduces alternative methods whereby the needs of the future may be satisfied.

Interest, according to some writers, enables saving to proceed by a particular method, which in its turn tends to a larger provision of capital.

At different points in the foregoing pages it has been suggested that saving might well proceed in view not of interest, but of the sum itself saved. But the

substitution of this total sum introduces a fresh element of complexity. Postponement after all is the postponement of present for future satisfactions, and it will take place only if these future satisfactions be both equivalent and attainable. If, however, postponement involves, as it does, the investment of what is saved in forms used in production, those who have postponed their satisfactions will require either a yield from the use of these forms, or the transformation of these forms of capital into goods suited for direct consumption. They save in order to enjoy, and so long as their savings are being used by others as capital, their enjoyment is impossible. They do not save in order that their savings may be used in production, but in order that their future needs, contemplated from the standpoint of the present, may be met. Since this cannot be the case while their savings are so employed, they will seek to withdraw them. Any such withdrawal, whether it takes place by the non-renewal of implements or weapons by the solitary individual, or by the gradual diminution of holdings of stock by individuals in a highly organised community, must, some writers urge, have a bad result so far as productive progress is concerned. It is obvious that the different results occasioned according as saving takes place in view of its own total consumption in the future, or of its permanent investment in capital forms in return for a certain share in the annual yield of these, require investigation.

On this point the considerations which have found a recent and able exponent in Dr. Cassel are very forcible. He points out that the aim of saving is consumption in the future, and that if consumption be

not satisfied by a rate of interest, in some way or other the sum saved will be withdrawn from its capital forms ; that therefore a minimum rate is required to prevent such withdrawal, and this rate due, as he says, to the limited duration of human life, he estimates at above one and a half per cent. In other words, it is argued that as saving takes place in view of future consumption, and as future consumption is restricted in the time over which it can be spread by the average duration of life, a rate must be offered to prevent the gradual consumption of the total sum thus saved. The main contention, however, may be separated from that which involves the estimate of the particular rate required. In effect it amounts to this : that a rate of interest is needed, not necessarily to secure initial postponement, not even to ensure investment of what is postponed in productive forms, but as providing a particular method whereby saving may remain so invested, and accumulation may be progressive and increasing. Interest, it is urged, is necessary unless capital itself is consumed, and such consumption, it is argued, will prevent the capital used in industry from being as large as might otherwise be the case. The conditions under which future needs are satisfied must be considered.

So far as initial postponement or saving is concerned, enough has been said to show that interest is no necessary or permanent element in the process. But the time will come when some of the objects in view of which saving has taken place press for realisation, and then, unless some other means be found, wealth embodied in the form of capital must be translated into goods suited for immediate satisfaction,

This can take place, but only within certain definite limits and at a certain cost. It is possible so far as the savings of succeeding generations are adequate to replace, and so liberate, the savings of those anxious to withdraw. A constant succession takes place of people postponing and of people realising; those postponing gradually realising in their turn, and being replaced in the task of postponement by others. Given such a condition, the capital converted each year into goods for consumption would be replaced by the savings of others, necessarily placed for the time in the form of capital, because no other equally convenient means offers. Increase then is possible only so far as the savings of the rising generation exceed those of the generation previous. Under these circumstances no rate of interest is necessary, but its absence is coincident, it may be urged, with a lack of increase in capital. Savings which would have gone, on this contention, to swell the stock of capital, are now diverted to the mere replacement of that part of capital which is being converted into immediate goods to satisfy the requirements of those to whose postponement it was due. A rate of interest is declared to be necessary to prevent such a state of things. It must be sufficient to outweigh the advantages conceived of as likely to be enjoyed by the gradual consumption of the sum itself. One point requires attention: the relation of this rate to the annual portion of capital withdrawn if there be no interest, since it by no means follows that these will be even approximately equivalent.

The matter thus raised amounts to the desirability of substituting an indefinite annuity large

enough to act as an equivalent to the terminable annuity to be obtained by the consumption of the sum postponed over an estimated period. Interest is required to induce people to go on waiting and to prevent the assumption of the form of capital by wealth, which has been accumulated, from being merely temporary so far as the individual owner is concerned; though owing to successive changes in ownership, capital might remain undiminished.

If interest is to induce those who have saved from satisfying their wants by the simple and ready method of satisfying them out of the capital sum, it must provide an equivalent to the satisfaction to be obtained in this way. Under the method to which recourse is had if there be no interest, with each satisfaction a diminution takes place in the means of providing for future needs, this being particularly noticeable when the end of life draws near and the store of capital approaches exhaustion. Even when provision is made for a period beyond life, that is, for the wants of others, a point is reached some time or other when little remains, and where in consequence any particular emergency will find the owner of the accumulations unprepared. But this is not the case when provision is made out by capital with interest. Then the deduction made each year leaves the capital untouched. There are certain considerations of great force which tend to reduce the rate needed for this purpose far below the annual amount withdrawn. In the first place, an undiminished reserve is secured to meet emergencies; in the second place, capital may be left also undiminished to others; while in the third place the actual possession of wealth cannot be ignored.

as without influence. With reference to this latter point it should be remembered that the mere payment of interest does not make the consumption of wealth by means of a terminable annuity unprofitable; it makes the annuity larger. If people are so ready, as some would suggest, to proceed to consume the capital which they have saved unless some considerable interest be offered, it may well be asked why the annuity into which interest enters should not induce a like practice even when interest be paid. Obviously no rate of interest can be offered which will equal the terminable annuity which can be obtained when the interest itself enters into that annuity. From these and other considerations it may be assumed that the *adequate* rate of interest may be very much less than that rate of terminable annuity which involves the restriction of the *individual* capital.

What has been said as yet hardly touches the substance of the contention now under consideration. It may be admitted that the absence of interest will not put a stop to all saving, or again that the rate necessarily paid may be much less than that amount which would be annually withdrawn from the total accumulation; but the question at issue is whether the method of saving associated with interest will result or will not result in a more ample provision of capital.

The arguments in favour of an affirmative reply may be stated in different ways. Thus it may be said that a method which enables men both to obtain some use of wealth and yet to retain undiminished the total sum, either in view of emergency or for the sake of others in the future, or even for the sheer pleasure of possession, will be preferred by those now saving.

to one which involves a diminution of the amount accumulated. But this is far from conclusive, since *they* would certainly prefer any method which might involve less personal self-denial. The question is not if they prefer it but if it brings about a larger provision of capital. A better way to state the case is as follows. It must be admitted by all that those who save will desire to obtain the use of what they have saved during a limited period of time, not necessarily a period limited to their own lives. At the same time, though some part of the satisfaction thus sought may be realised after they are dead, they will in nearly all cases require some result during life. This more intimate and personal demand will further, it is argued, be felt so strongly that unless its satisfaction can be at any rate partially achieved, the farther or more distant objects will be foregone and attention concentrated on it alone, or, to be more accurate, on its satisfaction together with some small provision for the more immediate requirements of a family. In other words, the needs of the more indefinite and distant future will be neglected. Saving under an interest-bearing system furnishes a method of meeting the nearer needs without neglecting those which are both vague and distant. Thus it enlarges the area in view of which accumulation is pursued, and provides a practicable way of making some adequate provision for both distant wants and those near at hand. Again, it gratifies the somewhat inexplicable and yet undoubted desire which is felt for the possession of a large total sum of wealth. The points thus stated are both important. Firstly, it offers a practicable way of adequately meeting

wants over a longer period, failing which the period under contemplation will be much shorter. Secondly, the pride of possession, and of possession which remains undiminished, is given its due weight.

But now something must be said as to the operation of the forces which may be represented as coming into effect under the incentive of interest.

It is assumed that with interest a difference exists as to the part played by possible objects of saving as compared with that under the alternative system where accumulations are gradually consumed. A smaller but indefinite annuity, accompanied by a possible recourse to a capital sum, is substituted for a larger annual amount involving decrease and ultimate extinction of the sum saved. The fundamental assumption here is that but for some such composition between different needs, some, and those naturally the more distant, would be ignored, and that therefore the extended area of needs will lead to a larger total accumulation, and thus to a greater provision of capital. Leaving, however, the question of their neglect, a matter which admits of some argument, on one side, it must be observed that the increase will not be as great as it might seem at first sight.

So far as the individual himself who defers consumption of the total is considered, an immediate tendency in this direction is possibly brought into play, but the matter while it begins, does not end with him. Others are involved, and it is in connection with them that the permanence of the capital sum thus secured has certain contrary effects. Put broadly, the assumption to be canvassed involves the conception that the same provision for the future, or rather the same

future satisfactions, may be sought by different amounts.

But what effect will this retention of capital have on future postponement? At first sight it might seem as if, so far as production is concerned, this would be so much to the good; that, in other words, the desire to provide for the future, which under other circumstances would have operated to provide enough to replace the large amounts annually withdrawn, will remain in force; and that in consequence a larger amount of capital will remain for employment in industry. Two considerations, however, must be taken into account. Firstly, so far as many are concerned the inheritance of capital will clearly exonerate them from the unpleasant necessity of saving. That task which might have been theirs has been performed for them, with the consequence that abstinence on their part will be cheerfully foregone, and savings which might have been made will not be made. Secondly, the greater security, or the apparent greater security, against all possibilities thus assured by the retention of the total sum, with the possibility of recourse to it if required at any time, may in some cases actually tend to the diminution of saving. This particular method offers a security against risks and chances much greater than that which can be obtained when capital is withdrawn bit by bit, unless an amount be saved far in excess of that which can be necessary on any reasonable basis of supposition.

Hitherto we have been proceeding as though the offer and payment of interest would uniformly or almost uniformly occasion an alteration in the objects dominating saving, and so in the period on behalf of

which saving takes place. But this is not necessarily the case. There are those who intend to exhaust all enjoyment from what they have saved during their lifetime. With them interest will cause no change in method. They will continue to eat up their capital in yearly portions, but the annuity thus enjoyed for a period of years will be greater than if no interest were given. If they save in view of a definite annual amount, they will not need to save as much under the dispensation of interest as when left with the bare and unaugmented sum of their own accumulations. Again, some of those who save are already so keenly alive to far distant needs on the part of others that the offer of interest can cause no difference in their aims and in their anticipation of needs. When and where this is the case it may well be argued that those who are saving under the method which dispenses with interest will require to accumulate more than if interest enter into account. Lastly, saving takes place in many cases where the distant future is of no account. The desire to provide against accident and for certain fairly definite needs which, if experienced at all, will be experienced at definite times, as for instance the education of children, cannot be reckoned as affected by the contentions previously stated. In such cases interest leads to no alteration in method; it only augments the amount to be consumed, that consumption taking place under the same circumstances as before and not being spread over any prolonged period. This is so when saving is made against accident or emergency, and for other like objects independent of the duration of life. It is so also with those who use it merely as a means of

obtaining a larger annuity rather than as a means of keeping at disposal the capital sum. Again, apprehension as to possible need and the desire to leave money behind operates, though less certainly, even when capital is consumed bit by bit. Any provision under these conditions must mean a surplus of saving far greater than can be justified on a basis of rational possibility ; and the more certain security guaranteed by capital with interest may in some cases lead to a positive reduction in the amount thus kept back from consumption.

As against these considerations there are, however, certain other considerations which can be advanced as likely to restrict their effect, at any rate to some extent. In the first place, those who inherit capital and continue to keep it as capital instead of consuming it as they might are not practising any ordinary abstinence as far as their income is concerned. If they had to replace their portion of the capital consumed, as might well have been the case, they would have done so at the cost of considerable present satisfaction. But when they merely continue postponement, they at any rate are not called on to relinquish increments of equal present utility. It is by no means impossible that they may be disposed to postpone something more, the apparent cost of the mere postponement of the capital sum which they might use, being but little. They start at an advantage whether they do this or not. In the second place, moreover, we must remember that under ordinary circumstances the distribution of capital which ensues when interest secures its continuance, and so the handing down of accumulations

from one generation to another, is likely to be anything but uniform. In earlier paragraphs we have spoken as though those who inherit wealth from others would inherit it in much the same proportions as they might otherwise be disposed to save it; as though, indeed, there would be a general uniformity, each man being disposed to save equally, and each likewise receiving wealth from the preceding generation in equal or uniform proportions. This is far from being the case. As a result, accumulated wealth will descend to some wholly out of proportion to the part they might play in that general saving required to replace the gradually consumed wealth of one generation out of the wealth of those succeeding it. Some will inherit less than they would be prepared to save, others more. The former, in consequence, will remain under the same motives and necessity in respect of saving as otherwise, while the dislike to consume capital will deter the latter from a ready diversion of the increased wealth coming to them into immediate commodities.

Any attempt, then, to decide the matter which has been discussed must take into account two closely connected though still distinct considerations. In the first place, we must note the difference in amount between the interest which enters into consumption and that part of capital which would otherwise have been withdrawn for the same purpose. Reasons have been given for such a difference. They amount to little more than this: that somehow or other forces have been generated which make for continued postponement, that is to say, which make consciously or unconsciously operative certain wants still farther off in the future. On the other side it has been pointed

out that with some persons such forces will fail of their effect altogether, while in the case of others apprehension extending to the fullest extent might exist without the phenomenon of interest. Further, it is open to doubt whether motives such as these, even if of present effect, are likely to be permanent. In this connection, too, it is necessary to recall what has been said as to the deterrent influence of inherited savings upon further accumulation.

In the second place, there is the fact that the interest which is paid and which obviates the necessity for withdrawing wealth for the purposes of consumption from capital, is provided not by those who wish to save but by those who wish to use the savings of others. Thus it might seem as though saving by this method extracted something out of present means over and above the amount saved for saving's sake. But this is the point at issue. Of course if what is postponed remains as before in amount, and further is kept longer unconsumed owing to the substitution spoken of above, there would be a more abundant supply of capital. It has, however, to be pointed out that the greater permanence of the capital when saved renders saving on the part of those who inherit less necessary. Should the amount of capital at the disposal of industry be the same under both systems, all that will happen will be that the renewal of the capital has been transferred from those who might have saved to those who use the capital.

But if the amount remain unaffected by the employment of interest, the absence of change will be owing not to a uniform absence, as it were, but to alterations in one direction being balanced by alterations in

another direction. It is indeed tolerably clear that so far as some saving is concerned interest will cause an increase, but decrease may occur in other cases.

Of the reasons which have been mentioned as making for increase, some are especially cogent in particular phases, and may be considered, at any rate in one or two instances, to have much force at the present time. Firstly, the desire to be possessed, and to die possessed of a large sum, apart from any very rational idea as to its use, weighs with many. Secondly, till recently the methods of insurance have been imperfectly utilised for saving, and hence interest has presented the only obvious and secure method of making provision for wants and for a period, both indefinite. Thirdly, interest may prove an incentive to saving when objects remote in the future are very dimly realised.

Despite the importance of these considerations under certain conditions, or even at the present, there is no ground for assuming that they are permanent or invariable factors. Indeed, the contrary is the more tenable conclusion, since with every increase in intelligent anticipation they lose some of their force. The desire for a large capital sum might indeed be a motive for saving more, quite independent of any inducement in the form of interest.

It must be asked what is the essential principle, which it is alleged, absolutely severs saving in the phase and under the conditions described in the present chapter from that which occurs under the more general instinct to postpone from the present to the future, and which makes interest effective in the one though not essential in the other case. It

has been suggested that some such principle is to be found in the limited duration of life. Thus if the period of future desire were wholly unlimited, accumulation and postponement might proceed indefinitely and without restriction. But surely, on the other hand, if the period were distinctly limited, any intelligent person saving would desire that the whole of his savings should be exhausted by the end of that period. The claim for a minimum rate must therefore rest on the ground that the objects of postponement in, at any rate, a large number of cases are partly near and definite, and partly remote and indefinite, and that interest enables a partial satisfaction of both, failing which the more remote would be ignored. But this involves assumptions which have been already noticed. Possibly the real idea which underlies this attitude is the feeling that it offers the most practicable way at present of meeting various wants very different in character and as to time.

Should it be granted that in certain cases, admittedly a very large number, some minimum rate is required for reasons given above, two things seem clear, that it need not be high, and that its effect, even in these cases, will not be great. Moreover, it must not be forgotten that other cases exist in which satisfaction of distant objects is no motive, or in which these exert their full effect without interest. The same rate will have to be paid in these other cases, and may decrease saving for the purposes therein involved, while further it will for certain reasons be below the rate not only offered but actually demanded under existing circumstances and in a competitive society.

In the first place it will be paid not only to those hesitating as to the consumption use of some portion of that saved, but to all successive or other holders ; in many cases, that is, where provision for the future is in process, and where withdrawal for use is far distant.

The essential need for interest in this connection is to prevent accumulations saved in view of future need from being themselves consumed, and thus withdrawn from capital use. The possibility of this is to be safeguarded by providing some form of yearly increment sufficient to outweigh in utility the satisfaction which would accrue from the gradual withdrawal of the total sum. An annuity, that is, spread over an indefinite or at any rate a very long period, is offered instead of the annuity which could be obtained by the distribution of the capital sum in yearly instalments over a limited number of years. The yearly amount will not be the same, because with the former goes the possibility of a recourse to the expenditure of the capital at any given time either by the original owner or by those to whom he may leave it. But this in effect makes the yearly payment of an unspecified duration ; as long, that is, as the capital expenditure does not occur. The sum carrying with it the claim is handed over from one to another, and is always being deterred, as it were, from its own use by a new decision to accept interest in lieu of its own consumption. Every new owner has a fresh choice ; and thus, quite irrespective of the factors present to the vision of the original possessor, a gain in interest accrues. No doubt in giving up capital consumption in favour of a small annual rate, together with the

possibility of using the capital in case of need, the man who saved has before him his own need and that of his immediate successor, possibly of one life beyond; but it cannot be urged that his decision rests on this process without some sort of limit; and yet interest continues without limit of time, because each fresh owner avails himself of the opportunity to decide anew.

If, on the other hand, it be urged that these future possibilities lie within the range of vision of the original accumulator, it must be replied that this credits him with an aim in saving quite outside the period to which, by previous assumption, his view is restricted. In other words, he would seem to be actuated by the desire to provide for an almost indefinite future. The effect of the introduction of interest and of the conduct of saving under its stimulus is bound up with provision made consciously or unconsciously for the needs of a more distant future. Unless the period of anticipated future consumption be prolonged, there would seem to be no reason why saving under the dispensation of interest should result in larger accumulations than would be present otherwise. The extent to which such a period is prolonged, if at all, by the conduct of saving in this way, is open to much question. Even if it be agreed as above that such is, under present circumstances, likely to take place in many cases, the permanence of such a result is open to doubt.

In the second place, it is not only obvious that the actual rate of interest, determined as it is by circumstances of demand as well as of supply, will be constantly in excess of this minimum rate, but exceed-

ingly probable, if not certain that a higher rate than the necessary minimum will be demanded. As an illustration we may take the somewhat extreme case where apprehension is so keen that postponement of a given sum might take place in view of a future sum less in amount but vested with greater utility by anxiety, interest would be due on this future sum. But with its introduction and the change, which by assumption takes place in the system of saving and satisfaction, a curious result ensues. The extent to which capital goods can be exchanged into immediate commodities depends on the provision of fresh capital. With interest serving in place of capital as a means of satisfaction, the total amount of capital will by hypothesis be greater than could be realised all at once; but few will want to realise, and therefore those who do, will realise at full value. Consequently interest will be demanded, not on the smaller future amount, but on the whole amount postponed. Let us put the matter in another way. The keener the apprehension, the less in quantity might be the future equivalent. In that case, the interest necessary to deter people from living on their capital would be due only on the future equivalent, since that would be all that they could expect to consume in the future. When proportioned to the original amount it would give a lower percentage. But when, owing to its agency, those who seek realisation are few, every one will imagine himself entitled to an equal amount, and consequently to the full rate on that amount and not on its mere equivalent, should that be less. This is the inevitable result of the alternatives offered to those who have saved, of either taking interest or of con-

suming the sum saved by withdrawal. On the one hand, the possibility of consuming the capital makes the interest required such that it will, with the advantage it brings with it of retaining a possible fund for emergencies or for others, outweigh the terminable annuity which might be gained by the consumption of the capital given. But for this alternative, saving might proceed for a lower increase in interest. On the other hand, interest restricts those who realise, and leads to the demand for interest on the total amount postponed. Each alternative is played off against the other to the obvious gain of those who save and receive interest.

## CHAPTER VII

### INTEREST AND SAVING

INTEREST has been dealt with in its relation to saving at different periods and under different conditions. It remains to discuss how far the various considerations, brought forward in the preceding chapters, allow of a consecutive and consistent theory.

Throughout what has been said, it has been assumed that for saving to any large amount investment for the time in the productive organisation of the country is a practical necessity. In other words, interest is not viewed as a necessary inducement to the temporary employment of what has been saved. With or without it, saving must assume that form if it is to take place in large quantities and so to satisfy great future needs. In support of this, the unsatisfactory character and positive insecurity of other methods have been adduced. But in conjunction with this, it has been assumed by some and argued by others that part of the gain accruing by means of such employment is required to induce people to save at all or to save largely. So long as demand for capital exceeds supply, a very obvious fund for the payment of interest is provided; and there is indeed a certain speciousness in the tacit

suggestion which underlies many arguments in this direction, of a connection between the amount thus determined and the quantity of wealth accumulated and put at the disposal of an industrial community as capital. Of recent years, however, this view has been worded less strongly and less definitely; it has been urged that a payment out of this fund, or some rate of interest, results in an increase of capital, that is, that without it there would be less capital. The crucial question is whether a rate of interest is or is not an essential condition of the provision of capital in certain quantities.

It is true that a certain fund, by whatever name it may be called, will exist so long as demand for capital exceeds supply. As has been said, it is a necessity in the distribution of capital among those competing for its use. Some one must have it. But need it be handed over in the interests of the community to those who are engaged in saving? It is equally true that in a competitive society as at present organised this will be its normal destination. Here, again, a question presents itself. It may be inquired whether they receive it in virtue of anything they do or abstain from doing, or by reason of the position they hold and the power they can exert under existing social conditions.

The relation of interest to saving has presented itself in two aspects.

With regard to the first, which is revealed in the contention that interest is required as a kind of increase to make future consumption as attractive as consumption in the present, and so to induce postponement from the one to the other period

certain conclusions which point in a contrary direction have been indicated. Thus it has been pointed out that the effect of interest in this connection varies with the different objects in view of which saving has been undertaken; that in certain circumstances its payment tends to restrict rather than to encourage saving; that in consequence the same amount of accumulation may be achieved at different rates of interest; and that, further, the future consumption of the amount postponed without increase might suffice. With the growth of apprehension as to the future, the superfluity of interest in this respect becomes obvious and its restrictive influence more marked. Given great anxiety, it is even possible that *any* payment of interest may tend towards a reduction rather than an increase of capital. But even if a minimum payment be needed, an excess over that minimum is unnecessary and will probably not produce further accumulation.

The second aspect in which interest has been viewed as essential, though different in form, involves the same principles. Here interest is treated as required in order to induce people to abstain from the gradual consumption of what they have saved during the period, in view of which and its wants, saving has taken place. They are to have in lieu an annual increment smaller in amount, with, of course, the right of recourse to capital consumption if desired through any change in circumstances. Again, there is abstinence from consumption or postponement; but in view of what? In the first place, such postponement will have as its object the retention of the total sum for use or to gratify the desire of

possession. In the second place, an extension is given to the period during which consumption takes place as a result of previous postponement and saving. This prolongation may be due to a conscious desire to save for far-distant objects—objects, that is, which concern the future of a family, or which may be the unsought-for consequence of the desire to retain for a limited period the power of recourse to the total sum. If interest be required to induce this maintenance of capital in its total amount for a period, it will obviously be required to prevent its wholesale consumption as that period lapses to an end.

According to this view of interest, the result of saving under its influence is the gratification of desires and objects other than those which would have been gratified had saving been followed by a gradual consumption of the wealth accumulated and used as capital. But the question must arise as to the part played by these desires and objects in such case. Different alternatives present themselves. If these desires as to the future are indifferently present whatever method of future consumption be adopted, the saving which would have to take place on the part of those who might consume the total sum would probably be greater than if interest should come into count. They would have to save enough for a very long period and also sufficient to act as a reserve to the end of that period and to leave to others: even then their task would be unsatisfactory. Again, if these distant objects, objects that are lying outside the period of contemplated life together with an added time for those dearest to the people saving, be of small moment, interest will result, in the case of

wise people, in a larger annuity and consequently in many cases in less original saving. As against this, the curious but undoubted preference for disposing of large fortunes at death rather than during lifetime operates. But thirdly, these new objects may be conceived of as arising, at any rate in part, from the new method under which future consumption may take place, that is, as due to the greater possibility of their adequate gratification. The problem is that of eating a cake and yet having it, and it may be contended that if a method be discovered of keeping the cake intact for emergencies and the future of others, provided that a smaller annual slice is eaten, these emergencies and the far-distant future of others will be deemed worthy and feasible objects, but that otherwise the cake will be gradually consumed in regular pieces. While it is most probable that the possibility of easy satisfaction greatly magnifies the importance of such objects, there is room for doubt as to their neglect in other circumstances. Lastly, so far as permanence is secured through reiterated postponement when such permanence is a mere concomitant of the retention of the capital sum for a period and no object in itself, a gain accrues beyond what would be an adequate inducement to the original postponement.

On the other hand, it must be observed that just in so far as the annual consumption of what has been saved is curtailed, certain objects go unfulfilled which otherwise would have been met. In other words, some future desires are unsatisfied when the future comes in order that others may be satisfied, these latter involving in their satisfaction a longer or a

practically indefinite period. The effect of interest in this aspect on the amount of capital depends on the relative importance of these two classes of objects and on the extent to which the class last named above owes any importance it may have to the system of interest. If they are of little weight in any case, or if they would press as urgently for satisfaction without it, interest could produce little effect on the amount of accumulation. The really crucial point is the connection of interest with this change in the desires obtaining satisfaction. Thus it is far from decisive to show that the withdrawal of interest at a given time might lead to a gradual consumption of capital on the part of a great many, since it is possible that but for the prospect of interest some might have been impelled to save even more than has been the case. Again, the tendency to attach more weight to far-distant wants is in part at any rate a general feature, and so far independent of the offer of interest. Even the general adoption of the system of satisfaction through interest together with a reservation of capital is not conclusive, since there is no evidence as to how savings would otherwise have been apportioned among the various objects now in view. It is explicable, for instance, on the theory that the possible application of savings to the various ends which it renders possible, enables provision for these ends to be made at the smallest present cost in abstinence to *certain* individuals. It does not prove that an equal provision in amount would not have been made otherwise.

Taking all in all it is probable, however, that the opportunities offered by this system cause more weight to be attached at a certain period to these distant

objects than would otherwise be the case, and thus will prove the occasion of more capital being provided so far as the savings of the class affected by such motives are concerned. The excess thus caused will not be great. To secure it a minimum rate of interest will be required. But this conclusion is very limited inasmuch as it leaves out of sight the effect of such interest on saving under conditions of time or person where such motives have little or no effect.

The two aspects which have thus occupied our attention are, it is obvious, very closely related, since in both the main consideration is the postponement of certain possible present satisfactions in view of future satisfactions, the chief difference between the two being that in the latter of the two the offer and grant of interest is assumed as bringing with it an alteration in the respective weight attached to different objects for which provision is or may be made. In both cases considerable difficulty is occasioned by the fact that those who save are influenced by different considerations, and so may be differently and even inversely affected by the payment of interest. The complexity is increased when the two are treated in conjunction, since interest which at one period may be necessary to prevent the consumption of the capital itself, thus operating towards its increase, may by being paid in the case of saving for objects which cannot fall under this category, limit saving. This is particularly true if the interest be in excess of the rate, if any, which we will assume to be required for that foregoing purpose. Here the effect of this excess will be experienced by those saving from the present for the future. *Thus it may result, if apprehension be*

*great, in less being saved and consumption being spread over a longer or indefinite period.*

What has been said in a previous chapter regarding the different effect produced by interest or varying rates of interest on those saving for different purposes is applicable, at any rate in part, here. Interest though it may be required to restrain realisation on the part of some, may tend to diminish the total capital in other directions by a restriction placed on saving on the part of others who are not influenced by distant objects. The mere fact of interest, if only they intend expenditure of their whole saving, capital as well as interest, within a rather limited period will lessen the amount required. Again, as operative in the same direction must be reckoned the effect which would be produced if it was desired to make provision by saving without interest for both distant and near objects, that is, if the wants now far distant were the conscious aim of saving. For reasons given before, the amount to be saved in such case would be greater than at present.

But these considerations lose part of their force when applied under present conditions to the difference between saving with and saving without interest. In the first place, saving with interest is a system by itself, and while differences in the rate may well produce certain results, it is difficult to estimate in like manner the results which might ensue were interest to disappear. In the second place, an interest-bearing system undoubtedly affects things by the greater assurance it offers that the savings will last long enough. In the third place, the desire to have, to retain, and when death comes to leave undiminished

the total sum of wealth is of great force, irrational though it often is.

Interest permits the steady maintenance of individual capitals to be secured side by side with some amount of benefit to the individual concerned. In the same way it renders a provision for after generations compatible with means of retirement and the like. Of course, in both cases, there is a diminution of the amount to be enjoyed during lifetime, or for immediate purposes, and it is no doubt true that in very many cases this postponement to the vague and indefinite future is without intelligible justification. In cases in which the definite needs of individual life are predominant, interest may well restrict rather than increase saving, but it is difficult to estimate the relation between these and those other cases in which some minimum rate is conceived of as requisite.

The matter may be briefly summarised. It is probable, though not certain, that a minimum rate of interest will increase capital somewhat in many cases owing to the deferred consumption of what is saved. It is certain that against the increase thus effected must be set the decrease which occurs when interest is paid where not required. It is far from certain that the present disinclination to use savings in some form of terminable annuity will prove permanent, in which case interest will diminish the amount of saving required for a given annuity.

A very careful distinction should be made between the two inquiries as to *present* need and the *essential and inseparable* need for interest as a means of securing accumulation in a high degree. This is

particularly important in the more general instance, dealt with first, since whatever the case now, the growth of apprehension undoubtedly points to a time where the preservation of the total sum will be a sufficient reward for postponement in consumption. Should this be so, the need for even a minimum rate of interest, however small, will rest entirely on the prominence it gives to objects which are more distant and demand a longer period for their satisfaction. In order to substantiate the proposition that a minimum rate will always be required in this connection, it must be shown both that it always will have such a result and that the increase thus achieved will not be counteracted by a repression of saving among others in other conditions. Further, it is obvious that the period in view of which saving takes place, even if *now* capable of extension, is not open to indefinite extension.

At the present time, however, it is clear that whatever the demand for interest, the rate will be determined, as has been said, by the relation between the demand and supply of capital, and that the excess thus occasioned may have very conflicting effects on saving.

## CHAPTER VIII

### DIFFERENTIAL ELEMENTS INCLUDED IN INTEREST AND WAGES

IN respect of the payment of interest, and particularly in respect of it as affecting the total sum of wealth postponed for future consumption, two things are evident. On the one hand, it is obvious that interest involves and includes much differential or rental payment because of the necessary uniformity of interest on all capital and the consequent remuneration at the same rate of both those who demand that rate on their last postponement and those who would have equally deferred their consumption at a lower rate or at no rate at all. On the other hand, it has been pointed out that the amount postponed does not necessarily vary with the marginal rate paid under certain circumstances for the last increment, that a different marginal rate might be introduced without affecting the total accumulation, and that the same total amount of accumulation or deferment is possible under different rates of interest. Not only is rent paid in all cases and on all capital except that affected by the marginal rate, but this marginal rate itself may be in part composed of rent. By rent here is meant a payment unnecessary for bringing capital into existence and operation.

Rents accruing to individuals or on different increments of savings are part of a phenomenon observable throughout the range of economic remuneration, as for instance in the case of *Consumers' rent*, *Producers' rent*, and the like; and *Postponers' rent*, as the present may be called, so far as this point is concerned, must be considered in relation to these, and especially to the similar rent which occurs in the case of work and its rewards. Yet there are certain differences of an important nature. The extent to which such rent forms part of the payment is less in the case of labour where the power to work and the exertion involved in work varies with different kinds of work, and is bound up in each kind with varying personal characteristics and limitations, than in the case of capital where far greater homogeneity exists. At one and the early stage all capital may be regarded as homogeneous; but this is never the case with labour, where ability and ease in the performance of certain tasks goes hand in hand with marked incapacity for others. Interest comprises rent more essentially than earnings. Moreover, the position which such rents hold in the world of labour as affecting respectively different occupations serves in some measure as a mark of comparative advantage as between these. They indicate particular characteristics as of definite, even if temporary, importance in a given society or state. They cannot perform a like function with capital, because such functions do not exist by reason of its greater homogeneity. But this requires emphasis from another point of view. Rental payments in the case of labour measure particular abilities and powers. Innate skill, facility, prompt-

ness, and other features are stamped with approval. No doubt it is true that their deliberate acquisition with a view to immediate commercial value deprives payments of the nature of rent, still the payment at one time remuneratory is often rental at an earlier stage. Further, certain general qualities are encouraged. These must be distinguished from the more specific qualities hitherto treated of. Every occupation involves particular aptitudes, the possession of which in any great extent renders the task in question less laborious than it would be otherwise. Work which is onerous to some is very light to others. But aptitudes of this kind are the occasion of rent in particular cases, and though not the immediate result of training or of direct acquisition, may have their growth encouraged by high rental rewards attracting the energies of the community into different directions. Much the same may be said with regard to the more general qualities of habit or mind which lighten the effort required for all and different tasks. Habits of industry and method, though the result of general influences in society and hardly of the nature of labour to be specifically remunerated, undoubtedly relieve their fortunate possessors of much of the feeling of toil otherwise experienced. They are acquired imperceptibly rather than intentionally, and their possession brings in an additional payment, which is of the nature of rent. While such is the case with labour and wages when difference of aptitude and variety of equipment form a basis for rent, how, it may be asked, does the matter stand with capital? Here rents exist, as has been said, even to a larger extent, since capital is more homogeneous. Circumstances, however, differ.

The personal characteristics, qualities, and aptitudes, valuable in labour, do not find a counterpart in the case of capital. Here rents correspond to differences in the estimate of the future as compared with the present, but beneficial though a truer estimate be, so far as the provision of capital is concerned, and so long as it does not exceed the limits of necessary thrift, it is otherwise when it passes into apprehension. Skill and industry are generally, if not invariably, beneficial; they diminish the time necessarily devoted to certain tasks, and so furnish opportunity for other tasks or for leisure, but apprehension of future want and need, involving as it does sacrifice of the present to the future, is obviously capable of exaggeration and an occasion of loss. Avarice is waste, though in general respects waste less socially disastrous than over-lavish luxury. From another point of view also rent in the two cases must be distinguished. Rent may mean a higher general reward throughout the whole sphere of production than people would necessarily require for either their labour or saving. To increase reward above effort is the aim of industrial progress. All effort is to be more productive and to reap greater advantage. But surely in such case we must discriminate between the result of such benefits when connected with earnings and when comprised in interest. In the former instance they become incorporated in the general standard of living, and are more widely spread over society than in the latter, where they affect one class, or society in one aspect alone. So far then as rent is involved in the general increase of the unit reward of effort, it is desirable to diminish, when or where possible, that accruing to

capital in favour of that falling to the share of labour. Again, in the case of labour and wages a rise above the marginal payment, that is, in the remuneration paid per unit of labour above the amount necessary to secure labour equal in time, has some effect on the actual efficiency of the labour. It might indeed be said that the unit of labour ceases to be the same through its direct development in skill; it is even truer when the alteration occasioned in the general industrial atmosphere is taken into account with the reaction of this on future ability, aptitude, and power. Labour is closely associated with wages, and conditioned by them at least in some degree. The same cannot be said of interest and capital. A rise in interest does not make capital more efficient.

From another point of view, that is, with regard to the effects produced by alterations due to rent on the margin, a difference is to be noticed between interest and wages. The circumstances of the present and its degree of satisfaction place in certain cases a rigid, in other cases a comparative, limit on the wants of the future. When this is so, a rise in interest will tend to decrease the amount of accumulation. There is no similar restriction, comparative or otherwise, in the case of wages, and in consequence a rise of these above the necessary amount will occasion a falling off in industriousness only when it has risen more quickly than demand, and is in advance. An advance in the general standard of comfort ensues, and matters once more attain equilibrium. The difference thus indicated is simple. In the case of wages, or in the case of general remuneration, a disturbed relation between the standard of living and the remuneration may lead to a

disturbance outside until these shall have regained permanent and equitable relations. But alterations in interest as interest or payment for postponement affect but little the standard of living of the present, which it must be remembered in certain cases affects the standard of living of the future. The standard which governs is untouched. When, however, postponement takes place in response to the more general desire to be better off, the question of time playing a comparatively unimportant part, the standard of the present does not exercise the controlling influence, and a closer analogy exists between it and the case treated of as occurring with wages. The question is rather one of general income than of future remuneration.

This matter is of great importance in any comparison of the results following respectively on rises in wages and rises in interest. So far as the objects of saving resemble in their several characteristics those which stimulate work and are embodied in wages, alterations respectively in the rate of wages and interest may promote energy in either direction, because in both cases demand is elastic and susceptible to the prospects of greater comforts and luxuries. In both cases these comforts and luxuries, at first exceptional, may become matters of necessity, and incorporated in a rising standard of comfort. On the other hand, in both cases where the standard or demand is at all rigidly fixed, rise may tend in a reverse direction; but such fixity is rare when the general impulse is a desire to be better off. Fixity, however, is more common when a fall in the separate rates is experienced, since then the loss occurs of something incorporated by custom in the standard. Of course in the case of labour when the standard is an

absolutely necessary standard of bare maintenance this tendency might be pushed very far, but such instances are rare; in other words, falling wages are not productive of more work. But in the case of saving there is a large group of cases where the standard is definitely regulated by reference to another standard, which exists untouched—at any rate initially—by alterations; this group is peculiar to saving and without a counterpart in the case of labour. Alterations in interest affect the means of satisfying future demand without affecting those appertaining to present demand, and future demand in this group of saving depends more or less rigidly on the present standard, that is, on the extent to which present demands are satisfied. The present determines the future, not the future the present.

## CHAPTER IX

### INTEREST IN THE COMPETITIVE AND SOCIALISTIC STATES

THE consideration of the restriction of postponement rent as far as possible, leads to the discussion of two points—its desirability and its possibility and method. The conclusion that it is desirable rests on the view taken of any rents which do not emphasise the importance of different qualities or aptitudes, and which in addition are the property of a limited and somewhat special class. It is not so much the payment of interest that is called in question here as the payment of the part that is unnecessary to the accumulation of a certain amount of capital, and only exists by reason of the present organisation for postponement. But the method whereby any such economy in interest can be achieved is a more difficult matter. At first sight it might seem as though the State could lay hold of this portion, allowing only that remnant, if any, to filter through to the individuals saving which is necessary as incentive to their action; but the consideration of the way in which this might be effected soon dispels the illusion. Those postponement rents cannot be taxed or forfeited because they are not known. They exist in the attitude or in the knowledge of the

individual rather than in any external form. Even that rent which is paid in interest all round because the relations of the supply and demand of capital occasion a minimum rate higher than that necessary to call into existence the existing capital, can only reveal itself by experiment; till when, its existence, even assuming such, can only be a matter of surmise. The difficulty would be overcome, no doubt, were the State able to assume the position of an intermediary between those who save and can lend and those who employ, taking toll of the postponement rent as interest passes through its hands, and paying the former that, if any, which is the requisite incentive of their postponement, while exacting the full rate from the latter. But this is impossible. The State would not have that special knowledge which leads to the encouragement of novel and experimental industries, and it would be enmeshed in a network of personal interests and intrigue.

Again, the provision by methods of national insurance for the contingencies of the future, as also for the period of old age, may diminish the amount of capital placed at the disposal of productive enterprise. It is true that the need of interest so largely composed of postponement rent as is that paid on the wealth now put aside for this purpose, will be dispensed with, but its disappearance will be accompanied by that of the capital sum itself. Insurance in view of risk implies a minimum of accumulation; and this is particularly true under a system of State insurance, in which the reserve would be formed of the credit of the country and the taxes would offer an elastic means of meeting both seen and unforeseen demands. Any

great scheme of compulsory national insurance against some or many of the risks in respect of which people save would probably contract the supply of capital. Such a result is far from meeting the difficulties of the problem which is to limit interest to the actual amount necessary to evoke the required postponement of wealth and accumulation of capital. To achieve this the State would have to go much farther, even to the substitution of a system of State for one of competitive industries. The general merits and demerits, disadvantages and advantages, of such a change, or even its possibility, must not be confused with this question, which only relates to the effect likely to be produced in this one particular direction. In such a system the State will incur the responsibility of providing the necessary capital, and will receive in the first instance the entire income of the country. This latter will have to be apportioned into earnings, general compulsory insurance against accidents, illness, and old age, the income needed for general State purposes, and that required for the replacement and increase of capital. It may be said that this is so different from existing conditions that no question of interest or even of anything resembling interest arises. This is true rather in form than in substance. So far as the theory of distribution is concerned, the essential feature of interest is that it allocates to one class, large though that may be, a certain part of the social income. The motive for such withdrawal in a competitive society is the prospect of the superior advantages in the future which will accrue to those who forego immediate consumption. In the case under consideration the State will have the whole

business of postponement in its hand, and the difficulty will be to arrange matters so that the generation or generations determining State action shall have enough inducement to diminish present income in favour of the requisite saving. The State, after all, is no featureless body without desire and without sense of time; to all intents and purposes it consists at any given time of certain generations with interests different from, and sometimes opposed to, the interests of other and succeeding generations. While, however, this is clear, it seems equally clear, granted the prevalence of equitable and dispassionate reason, that rents such as those involved by the unevenness of individual interest and desire will not exist, and that in consequence the diminution from future earnings will be restricted, at any rate, to the lowest rate of interest needed to provoke the postponement of a given quantity of wealth. This minimum rate will be expressed in advantages by way of insurance and other future provision somewhat greater in total absolute value than those provided by the community in respect of existing earnings and income. In addition, the State might allow private postponement of the consumption of income, that is, of deferred earnings, and it might encourage such deferment by the offer of a small minimum rate of interest. Any speculation as to the likelihood of such public saving would be out of place, as it introduces considerations which, whatever their importance, are wholly apart from the present matter. Given certain conditions, a State would be able to save at a lower rate of interest or with less subtraction from future earnings than can be achieved

under competitive organisation ; in other words, the saving of capital would be accomplished without loss to any save those previously enjoying postponement rents. Further, it may be noticed that the action of the State is determined by generations in different phases, so far as saving is concerned. Some are earning and looking to the future ; others again are seeking to enjoy, at any rate in part, the savings of the past.

Short, however, of an entire revolution in the methods of production, rents of this kind appear to be inevitable. But quite apart from any question of desirability and method it has been contended that interest, if it exists, exists by reason of necessity and remains despite any change in the social organisation. Its measure is the difference between the utility of things in the present and things in the future, and its origin lies in the actual existence of such difference. So long as that endures, it must last in exact correspondence to it, independent of methods of organisation and production. In other words, the added inducement which suffices to equalise a given amount of comfort within immediate vision with that same amount in the more remote future is required alike in individualistic and socialistic stages. In both cases without such an addition the future sum will appear so defective in utility as compared with the present that no person or society of ordinary intelligence will be guilty of so grave an indiscretion as saving or postponement. The justification of saving lies in the superiority of the future consumption over that of the present. Reverse the conclusion, and postponement of consumption is an act of folly in a rational being. After all, men must be regarded as acting on intelligible motives, and

the man who saves because he thinks the future use less than the present use is a fool. An addition which is but the necessary makeweight according to the ideas of the time is required so long as these ideas remain unchanged, whether the State or the individual performs the task of postponement. In this sense it is, it may be urged, impossible to abolish interest. Let us take the extreme case, and imagine that the Government should determine that a certain amount of wealth should be accumulated, and so a certain amount of postponement of consumption take place; and that this process should be carried on without the exaction or payment of interest. To secure its end it will stimulate involuntary saving by imposing taxes to the extent of the amount it desires, giving an undertaking to repay the taxes without any interest or addition. The wealth obtained will be utilised as capital, and may be conceived of as passing into production in the same way as it might have done had the postponement been undertaken voluntarily and accompanied by interest. But since the particular persons postponing their consumption will obviously go short of their interest, and so be surrendering a utility of certain definite dimensions for one of smaller extent in their eyes at the time when postponement takes place, the difference of utility exists and the amount of added utility which under a free system would have corresponded to it as interest also exists, although it will no longer go to those who formerly would have received it. It will pass either to the consumer in generally increased quantities of commodities, or to the producers if by monopoly or tax competition they can retain a larger profit than once was theirs, or to the State if the

latter can exact such a payment from the producers and retain it from the consumer. The matter is merely one of change of ownership. But change of ownership only changes the recipients and not that which is received. Even if it be suggested that the plan be pushed so far that all profitable employment cease, the position is not essentially changed. It is always possible to rob a man and to throw the plunder into the sea.

It is quite possible to admit the accuracy and force of the argument represented above and yet to deny the conclusion which to some has seemed inevitable, that change in organisation can achieve nothing in the direction of the reduction of interest. So far as interest is essential and a necessary make-weight as between utility in the present and utility in the future that is true, but surely the matter is wholly different if the sum paid as interest is in excess of what is necessary to equate the different utilities of a given sum. This will be readily admitted if the payments represent the necessary interest together with a certain surplus calculated and added in a simple way. But according to the argument employed in a previous chapter, the matter is more intricate. There the state of the case has been represented much as follows. With a given rate of interest postponement takes place to a certain extent, being shared in varying proportions by people or groups of people under the influence of different and respective motives. But if the rate alter, still the same amount of consumption may be postponed, provided that the ratio of contribution from the different classes be altered. Under such circum-

stances it is obvious that the difference between the present and future utility of the particular amount will itself differ according to the mode of operation in which the total is made up from the contributions of the different groups. So far, however, as the interests of the community in general is concerned, the one in which the difference of utility is the least is the most advantageous. It is at the same time the difference essential to the postponement of that amount from the category of present to that of future use. It exists quite independently of any particular system of organisation, and to some one must accrue the amount necessary to equate the two utilities. But any difference greater than this is due to the particular organisation under which it arises. It is due to it and not to any necessary circumstances, and with a change in organisation it vanished. With it vanishes, too, the amount necessary to bridge the difference. Put simply, the excessive difference between the estimate of a sum in the present and in the future occurs because postponement instead of being due to the action of certain persons in certain proportions, is due to the action either of these same in other proportions or of other persons altogether.

That this can be so is due to the curious complexity and interaction of the motives underlying saving or postponement of consumption. Were these simple and uniform it could not occur. As has been said oftentimes, the difference in time of consumption is the fundamental ground for the demand for the payment of interest. But as a motive and a measure it operates under special conditions as to, firstly, the effect on future provision of the existing standard,

and secondly, the keen realisation of future needs and anxiety as to their satisfaction. Changes in these respects affect the material estimate of the difference in time of consumption without impairing its fundamental importance. There remains the ground for interest, though its extent rests on other factors which determine the estimate formed as to the difference between consumption at one date and at another. This estimate represents the respective utilities of the two consumptions. But interest itself accruing in respect of any capital arising out of postponement necessarily lessens the position in the scale of utility of any other amount so postponed, unless it can be conceived of as giving rise to a future demand either more vivid or greater in extent. In the previous discussion on interest it was pointed out that owing to differences in the motives which lead to the postponement of consumption, alterations in interest may operate in two different and actually contrary directions. In the case of those whose aim is to make provision for certain emergencies and in view of certain events, the expenses of which are calculated according to an existing basis, interest lessens the utility of successive increments of saving, and so in itself is a reason for less postponement of consumption from the present to the future. On the other hand, where the opportunity of greater gain operating through any of a variety of motives induces to temporary sacrifice of indulgence, it does so because the greater prospect and opportunity opened up endows each increment saved with such additional prospective utility that not only is the previous tendency, where it exists, counteracted, but an

absolute greater utility added. These processes, as has been further pointed out, take place at the same time and may conceivably balance each other. At any rate they will tend in that direction. In this way the offer of a rate of interest higher than that necessary as a minimum may so alter the system under which postponement occurs as to become the actual basis of a new system, and thus to rise into the position of a new minimum. The difference between the utilities of consumption at one time and the other is altered. There is still the basis of postponement, but the value given to it as a factor changes.

Whatever may be the difficulties in the way of practice, theoretically it is at any rate possible to so arrange the circumstances affecting postponement that it may take place at the minimum necessary rate of interest, and so with the least possible payment of postponers' rent. One thing alone would render this impossible, that is, the continuance under every system of the same difference, if any, between utility of a thing in the present and the future, since in that case the same need of compensation, and, it might be said, the same interest would necessarily accrue. The point is not whether they would be apparent, or whether interest would be paid as such, but whether they would exist in substance. As has been shown, an alteration in the persons of those who save, or in the proportions in which they save, may affect the estimate placed on a given sum in the future as compared with that which it bears in the present. The difference in utility is neither a difference in the abstract nor is it absolute. It depends on the persons who save, and these depend,

at any rate in part, on the rate of interest which may be offered, and so a system of organisation which would reduce this to the minimum necessary would achieve a very considerable saving.

The effect which a change in social organisation might have upon that part of interest which under our present competitive system is regarded as necessary to accumulation by reason of the opportunity it offers for the effectual provision for very distant objects, and so the greater accumulation it achieves, is very different. As has been said, the operation of interest in this direction is open to considerable question even under existing conditions. In a socialist State its importance obviously will be diminished by anything which tends to promote a greater sense of continuity. The State, in theory at least, is more continuous than the individual. Further, State action in saving will be governed by the wishes of generations passing through various stages. Some at least of these will be in active contact with productive needs, and hence the desire to improve industrial efficiency by a liberal provision of capital may operate directly, and not have to make itself felt, as now, by the offer of interest. The motives which tend towards distant deferment will be strengthened, while, on the other hand, the desire to be better off by means of the use of capital will be more intelligibly expressed.

It may, however, be contended that the results of any such system might be harmful.

Any attempt to reduce interest from the competitive rate offered requires careful consideration in relation to three matters. In the first place, its effects on the amount of accumulation have to be examined; in the

second place, it must be shown that its apparent advantage is something more than a mere disregard of the difference between the utilities attained by consumption at one time and another; while in the third place, its general social consequences need review. Now in respect of these points it must be pointed out that the present argument is concerned only with interest not required for this purpose, and mainly with that portion which arises because of the difference in motive between those saving the given amount at different rates. The present contention is that this is occasioned by the circumstances governing the division of the income between wages and interest and the curious adaptability of the process of postponement to the rate of interest. The second matter has just been dealt with; and it has in like manner been shown that the difference in utility is not invariable. It may be greater at one time than another time. But when we come to the third point, very different questions arise. They relate not so much to the possibility of some such reduction, or its feasibility without any necessarily injurious effect upon the provision of capital, as to the general social results of the change in organisation. Such it implies. These cannot but be great, since the determination of the conditions under which saving or postponement takes place, means collective ownership and production in some one or other form. Anything short of this would be insufficient for its purpose. It may well be that many who consider interest as at present determined socially unnecessary, may shrink from a change which would have many and far-reaching results of an entirely different nature.

PART II

INTEREST AND THE THEORY  
OF DISTRIBUTION

1

## CHAPTER I

### THEORIES OF DISTRIBUTION ANALOGOUS TO EXCHANGE

THE various considerations which presented themselves in the course of the discussion on Interest, and particularly those involved in the effect of alterations in Interest on Saving, and the consequent supply of capital, render necessary some general review of the whole theory of distribution. The fact that the rise and fall of interest are not by any means necessarily followed by increase and diminution in the accumulated wealth of the country must emphasise the doubt, which some writers have obviously felt, whether a like uncertainty does not obscure the connection between all kinds of remuneration and the efforts which they are in general language supposed to remunerate and in turn stimulate. It may well be asked if similar results, for instance, do not hold good between wages and labour. Matters such as these point to the consideration of two connected though in certain senses dissimilar questions. On the one hand, the whole existence of a stable, automatic, and intelligible theory of distribution is brought into question. On the other hand, we are naturally led to ask if the classes receiving remuneration of different kinds have the same rational claim to those rewards; the most

intelligible reason for any such claim being the need of some such amount of wealth in view of the position of the particular class in society and the work which it has to perform.

A theory of distribution such as that which appears to some extent as a presupposition in economic writing, rests on a double assumption. It assumes, in the first place, some constant relation between the quantity of the reward paid to the various producing agents and their efficiency both in kind and amount, and in the second place, a similarity between the relations of the different kinds of reward and the efforts or agents with which they are connected. That this latter assumption is generally treated as essential to the existence of a complete theory of distribution cannot be asserted, especially in view of such theories as those which issued from the Iron Law of Wages, but none the less is it true that in many writings there is some sort of underlying belief that alterations in interest and alterations in wages cause changes which, even if not commensurate, bear some kind of mutual resemblance. In respect of it many questions arise. It may be asked, for instance, if interest is the same incentive to saving as wages to labour; or again, if the class receiving interest holds interest with anything like the same intelligible reason and tenacity as that which receives wages; or again, to put the matter in a slightly different form, if interest can be said to be paid to the same extent as wages to procure the doing of something which otherwise might be left undone. But these questions and the considerations which underlie them will be more fitly considered at a later point. The more immediate matter is the con-

sideration of the possibility of what has been called a stable, automatic, and intelligible theory of distribution. By this is meant a theory which accounts on other than arbitrary grounds for the division of the total produce of society between the various classes involved in its production in certain proportions and amounts. It must explain how and why a particular division is reached, and what would be the result of any attempt at arbitrary alteration. The best proof of the existence of such a theory lies in the provision, time and conditions being given, of a point of stable equilibrium by a particular division.

Such a theory suggests an attempt to treat distribution on the analogy of exchange, wages and interest playing the part of prices of the two respective commodities. Now in this attempt the essential point lies in the supposition that after the deduction of taxes, rent, insurance and other payments, and a provision for profits involved by questions of risk, the total produce remains to be shared between labour and capital according to the natural forces of competition. As in the case of exchange, alterations in interest and wages may be treated as affecting the amounts forthcoming in labour and capital in such a way that any excess offered in one form, either as interest or wages, will be redistributed and shifted backwards and forwards till equilibrium is reached. The problem, however, in the case of the exchange of commodities is essentially qualitative: it concerns not amounts but proportions, and oscillation and change are produced when the proportion or ratio which one commodity bears to another is overestimated in price. Rectification with its consequent readjustment of

price takes place by decrease in the production of one commodity and increase in the production of the other, or, in other words, by a diversion of the common producing force from one direction to another. But in what sense, we must inquire, can distribution be regarded as analogous to such exchange. Construing the matter most stringently, it would seem that the possibility of treatment on strictly analogous lines depends on the correctness of two assumptions. Firstly, there is the assumption of some common productive force capable of being embodied in the form of either labour or capital, and of changing from one to the other in accordance with the attractions of price as represented by interest or wages. Secondly, it must be assumed that changes in the amount of the reward offered in either case, as interest or wages, will have uniform effects; that, for instance, an increase in interest will affect the forces concerned just in the same way and to the same extent as an increase in wages would affect the forces providing labour. Leaving this latter consideration for future discussion when the whole question of quantitative relations comes under survey and when its discrepancies will be examined, it is clear that the first assumption, held as it is vaguely rather than explicitly, is incorrect; with it fails the purely and strictly qualitative attempt at a theory of distribution on similar terms to those which obtain in a simple question of exchange. Distribution cannot be treated as a simple matter of exchange unless the forces which respectively give rise to capital and embody labour can be treated as interchangeable and as having a common source. Even were this so, it can be

shown that the second assumption is independently unsound.

There is, however, another way of regarding the theory of distribution from the point of view of exchange.

According to this it is premised that alterations in the reward accruing to one or other of the agents engaged in the production, achieve change in the amount of the particular agent concerned. The suggestion is not that there will be a transfer made from the common effort to the force which is relatively the better paid, but that a rise in remuneration will occasion an increase in the quantity of the one agent without diminishing that of the other. Assuming the mutual need of the two agents in production and their necessary coexistence in given relative proportions, the immediate effect of any alteration in the amount of one of the agents will be an intensified demand for the other, which will show itself in an increased offer of reward for its services till the need is satisfied. This will go on till the proportions of the two forces are again stable though expressed in each case in larger numbers, and the joint product is so divided that no active cause remains for alteration in one or other agent. A rise in wages will thus by assumption cause an increase in the labour power of the country, itself the occasion for a more active demand for capital to enable the new labour to work with the former degree of efficiency. There will be a rise in interest to be followed by further supplies of capital, and the process will continue till the increased quantities on both sides stand related in the former proportion, the joint income being so divided that neither on one side nor

on the other will there be any immediate tendency towards change. A like series of changes in their unvarying sequence of cause and effect may be traced from an initial rise or fall of interest. But when we turn to scan the assumptions implied in such a conception, it will be seen that the great difficulty involved in the earlier theory based on the analogy of exchange is here succeeded by one of no less magnitude. It is assumed that rise and fall in rewards tend to occasion increase and decrease in their respective producing forces. Furthermore, and here in place of a novel difficulty there occurs one common to both theories, it is assumed that alterations in interest affect capital in like manner as alterations in wages affect labour. As far as analogy with exchange is concerned, it is clearly essential to show that a rise in the prospective reward occasions a rise in quantity of the producing power, and that a fall occasions a fall. The discussion of the effect of alterations in interest on the amount of accumulated wealth or capital is in itself sufficient to show how uncertain any such assumption is. So far as uncertainty is concerned, a like conclusion presents itself in the case of wages and labour. Even were the negative harder to prove than is the case, the task of proving the positive truth of the assumption would not be lightened, and after all it is with those who make the assertion that the burden of proof lies. Unless their assumption can be made good the theory rests on unstable foundations. But in certain cases at any rate the assumption is capable of easy disproof. Rises in rate of wages and salaries often diminish the willingness on the part of their recipients to exert themselves to their previous extent. In the case of

this particular assumption the existence of such instances in fair numbers is all that is needed.

With the failure of the assumption asserting a constant relation between changes in remuneration and changes in the same direction in the amount of labour and capital evoked, the explanation of distribution by a theory based on the lines of exchange falls to the ground. The problem of distribution is not analogous to that of exchange whether it be approached from the purely qualitative side or from that into which quantitative considerations enter. In both cases the assumptions essential to the respective theory appear to be unfounded.

But it does not follow from this that a stable, automatic, and intelligible theory of distribution as between interest and reward of direct effort is impossible. Only if it does exist it must differ from one based on the lines common in the theory of exchange. If, however, a solution analogous to that of exchange be rejected, any such theory must assume one of two forms. Either the relations between interest and capital and between wages and direct effort must be uniform and similar, or one of these agents of production, and so sharers in the products, must be more or less at the mercy of the other, and such that its reward, be it more or less, will fall to it after the claims of its partner have been satisfied. In this latter case, while one receives a reward which stands in some definite relation to its own amount and efficiency as an agent, the amount and efficiency of the other will not be directly dependent on its remuneration.

A theory of the first kind requires the fulfilment of one condition. Its truth depends, as has been said,

on uniformity in the relations of reward and effort, or remuneration and agent in both instances, that is, of interest and capital, and wages and direct effort. In both instances the agent must be similarly conditioned by reward; in both cases alterations in reward must be followed by uniform alterations in the amount of capital and of direct effort or labour. These consequent alterations must proceed to a like extent and be of the same kind in both cases. It will be remembered that a similar assumption was necessary in any solution of the problem of distribution on the lines of exchange.

The correctness of any such assumption calls for the most careful examination. On the one hand account must be taken of the difference between the conditions controlling wages and those controlling interest, while on the other hand the consequences both immediate and more remote of alteration in the rate of either kind of remuneration must be noted.

## CHAPTER II

### RELATION OF INTEREST TO CAPITAL, AND OF WAGES TO LABOUR

IN examining the respective relations between Interest and Capital, and Wages and Labour, and consequently the effect of alteration in the earlier term of each pair upon its respective correlative, certain considerations need to be borne in mind. In the first place, it must be remembered that future wealth—and future wealth is the object of saving—includes capital as well as interest. Those who save or postpone, indeed, can draw little distinction between the two. What they seek is the satisfaction of their wants in the future, and the implication with this satisfaction of a capital process is not *necessarily* of importance to them except in so far as better security is thus guaranteed. In the second place, present satisfaction, especially so far as the maintenance of life is concerned, obviously holds precedence of that which is to take place in the future. The relation between the future and the present is not one of abstract preference, but essentially concrete in its nature, and a most important point in it is the satisfaction of certain needs in the present as a necessary preliminary to an enjoyment at all in the future. In the third place, future and

present wants bear a relation corresponding to that just set forth. What we want in the future depends very largely on what we have in the present. It is true that this does not govern the whole of future needs, but it prevails so far that the standard of the present is an essential factor in determining the standard of the future.

With these considerations before us, it is clear that the relations between interest and capital or accumulation of wealth on the one hand, and those between wages and labour on the other, exhibit very considerable differences.

Firstly, interest is not a condition essential to the presence of capital in the same way as wages in the case of labour. No doubt, at certain times and with certain comparative estimates of the future as compared with the present, a rate of interest may be necessary to postponement, and so to the accumulation of wealth which serves as the basis of capital, but this is quite different from the position occupied by wages, which are at all times necessary for the reward and maintenance of labour. They are, as it were, involved in the very conception of an economic society. We are not here speaking of any particular rate of wages, but of the necessity of some rate of wages. The same cannot be said of interest, for, given considerable anxiety as to the future, it is quite easy to see that some postponement may take place without any prospect of interest, and completely undeterred by its absence. The difference can be stated from two points of view. On the one hand, there is a difference as incentive; for while labour will not be plied for nothing, postponement to some extent may take place without interest. Its incentive and reward will alike consist in the

greater anticipated enjoyment to be obtained from a given amount of wealth in the future as compared with that which it can yield in the present. Again, in point of actual maintenance, interest is not essential to future wealth, which does not need food and drink to maintain it in existence as does labour, for labour is combined with the labourer to whose existence a minimum rate is necessary. To sum up, future wealth itself may be the actual reward of postponement when its future use surpasses its present use.

Secondly, in an estimate of the needs anticipated in the future and the keenness with which they are felt, it is not possible to ignore the important influence of the existing rate of wage and the standard of life based upon it. The effect of the present standard on the future varies, no doubt, with the nature of the aim stimulating to postponement, but in most cases this standard is an important element to be considered. The importance is probably but slight when postponement takes place in view of emergencies or casualties, such as accidents, illness, premature death, and the like, since here risk cannot increase with wealth. Nor do the comforts required in most of these events vary proportionately with riches. A rich man requires more during illness, but not more in proportion to his general standard of life, since many of the other expenses which absorb much of his surplus income cease when he is laid aside. When we turn to the provision which is made for old age or retirement, the correspondence between the future and the present is much closer, the standard of the present determining the standard of the future wants, and these latter rising and falling with its increase and diminution.

In the case when the object governing postponement ranks as part of the general desire for wealth transferred for this once to the future, alterations in present wages and standard have less definite effects. A rise renders the immediate gratification of desire possible, and so far may be considered to diminish the intensity of future demand, but then the basis for such intensity is restored when the demand once gratified is again experienced and its gratification becomes thus a ground for future demands and ever-renewed gratification. Here are two possibilities, one pointing to a decrease, the other to an increase in future wants. Again, the question arises as to the effect produced in those numerous cases where completeness of provision is necessary to make the provision effective. In this instance the present standard and so alterations in it are probably of little effect. Putting all these cases together it is evident that while other and separate causes are at work to determine postponement, the present rate of comfort must be an influence of very considerable consequence. Such a conclusion has important results. It indicates, for instance, that an alteration in the general rate of remuneration, which affords the means of gratifying present desires, affects the extent of provision sought in the future and so the willingness of those who save or postpone. Their readiness rises and falls with its increase or diminution, and with readiness the need of inducement to save varies inversely. The more ready a man is to save, the less the need for inducement or stimulus. This reaction of alterations in wage upon the function to be performed by interest as an inducement to saving should be carefully noted.

Thirdly, there is an entire distinction between the part played by the standard of comfort or life in regulating the relation between wages and work, and that which is performed by that standard of comparison between the present and the future which incites postponement and determines its extent. In the former case we are dealing with a particular unit of measurement equating the pleasure to be obtained from the expenditure of the wages with the reluctance, or whatever it be, to do the work required. In the latter case the measurement is not simply between utility of pleasure anticipated and pain incurred, since it does not follow that an absence of want in the future would check the initial labour. It is one between pleasure at one moment or at another. But there are other differences more striking than this. The primary relation between the unit of pleasure and that of labour as embodied in the standard of comfort is easily capable of variation. It varies often and usually upward, and with each alteration the size of the unit of satisfaction as compared with the unit of labour changes. The standard rises easily, but once risen it is difficult to reduce. The chief cause of this, as the term itself would seem to denote, is habit, for the standard of life, comfort, or living, is little else than an expression to signify that a man will demand that which he is accustomed to have. Hence the effect produced upon the standard by a gradual and continuous rise in wages. A man who is accustomed to receive a certain amount of satisfaction in return for his work will require that satisfaction. If he becomes accustomed to more he will demand more. The relation between remuneration and labour is so purely

subjective that it can hardly be determined in any other way. Labour is one thing, reward another thing of an entirely different kind; and the average willingness to give a unit of the one for a certain quantity of the other cannot be determined by any external standard or measure to be applied to both. But the case is different when we turn to the consideration of the so-called standard governing postponement. Here we are dealing with two things like in kind and differing only in time of consumption. They are capable of comparison, and the only dubious matter is the capacity of the mind to appreciate a thing at a distance as compared with one close at hand. An alteration in the quantity received in the future in return for that postponed from the present, while it will render any one postponing unwilling to take less while he can get more, will not necessarily affect and will certainly not permanently determine the comparison made in the mind between the present and the future. That rests on outside considerations such as anxiety and realisation of risk, care for leisure, preference for one kind of satisfaction over others, and the like. Further, it should be noticed that with progress the alterations in the standard of comfort and the standard of postponement are unlike. The standard of comfort rises, and the standard governing postponement falls. The amount required for a given unit of labour has risen gradually but enormously, while on the other hand, the standard of postponement as expressed between the greater quantity of future things and the lesser quantity of present, falls with every change in keenness and appreciation of the risks and possibilities hidden in the future.

Fourthly, there is a reflex effect produced upon labour by alterations in wage which finds no parallel in the case of interest. Within reasonable limits it would seem to be true that rises in wages where continuous, and such that they are accompanied by rises in the general level of living, occasion increase in the efficiency of labour. This is equivalent to an increase in labour, so far as by that term effective effort is meant. Time wages have increased and time labour remains, be it assumed, undiminished, but labour measured in efficiency and productive power will have increased. In other words, wages, given certain conditions, may be regarded as exerting a direct effect on labour. This cannot be asserted of interest as regards capital. Whatever else they may do, alterations in interest do not affect the efficiency of capital.

The discussion conducted in the above paragraphs indicates several important differences between the relation of wages and labour on the one hand and of interest and capital on the other. These, indeed, are such as to affect the action between the correlation in their aspect of cause and effect, that is, of mutual influence in certain definite respects.

Firstly, interest unlike wages with labour is not the sole aim before those engaged in postponement : it cannot correspond then to the standard determining postponement as wages correspond to the standard of comfort or living.

Secondly, the conception of a standard of postponement is different from that of a standard of comfort or living. In operation it differs in three ways: as being more rigid and less responsive; again, as tending to fall instead of rise with progress; and lastly, because

it is itself affected by changes in the standard of living.

Thirdly, alterations in wage tend to produce alterations in efficiency through the medium of an elastic standard of comfort, whereas alterations in interest have no effect on the efficiency of capital.

The actual operation of these differences requires to be examined in detail, and this must now be attempted.

First of all, the case of a rise in wages may be taken.

Here one of three things may happen so far as its direct results upon the quantity of work done are concerned. Those engaged in working may restrict their efforts to such an extent that they will continue to earn the same wages as before. On the other hand, they may do as much work as before being instigated by a gradual rise in the standard of comfort. Lastly, more work may be done. If the first course be taken, two new circumstances will present themselves. Less work will be done, and so the competition for capital will be less keen; further, the object of the rise in wages will not be attained, since the amount of labour will be lessened and not increased. In other words, capital and labour so far from being brought into equable relations will be liable to further disturbance, since all indications point to a fall in interest with a probable further addition to wages. But the second alternative presents itself. In its case there is a rise in the standard of comfort; but this, as has been pointed out, implies in most cases a rise in the willingness to postpone—in other words, an increase of capital and a still diminished need of interest. On the other

hand, the demand, if it exists, for more labour is not complied with. If there be not such a demand equilibrium remains undisturbed. In the third alternative there is an increased amount of labour, which may go so far as to bring with it an increased competition for the services of capital. On the other hand, the rise in the standard will tend to produce an increased willingness to postpone. Here there would seem to be some approximation to a state of equilibrium. But this is rather apparent than real. Labour may increase in exact answer to the rise, or to a greater extent. If the first be the case, there would be equilibrium were it not for the fact that the concurrent rise in the standard of living in the present will have led to increased willingness to save; if the second, it is equally obvious that the increase in willingness to save will always be, as it were, a step in advance.

Next, a rise in interest must be treated in the same way and with like tacit assumption of definite and free competition between labour and capital.

In this case, too, it may be assumed that the rise may be accompanied by any one of the three like changes in the amount of capital. Either that may diminish, or remain the same, or increase. If it diminish, the desire for more capital will go ungratified, while, further, the actual diminution in the capital previously existing will lead to a decrease in the demand for labour and so to a fall in wages. But this in its turn would probably lead to a higher offer of interest. On the next assumption, that capital remains the same in quantity, nothing happens to affect wages and labour beyond the fact that a desire,

should such exist, for more capital will not be met. Lastly, if capital increase in amount, a position of equilibrium may be attained.

It must, however, be pointed out here that in the discussion it has been assumed throughout that wages are the factor which at once constitutes and determines the standard of comfort or living. In the main that is true, as may be seen from various considerations. Most people for their present means of living depend upon their present earnings. Even if interest enter into the income they spend, it forms a small part as compared with that provided by wages and salaries. Again, interest when actually received loses the character it possesses in perspective, of being an incentive to future action and a part of the aim set before those who save. The transfer of income from interest to wages does not affect the standard of living or comfort when interest forms part of that standard, since in that case it is only a transfer from one pocket into another; such is the effect experienced, however, when interest as a future payment is diminished to allow of the increase of wages. These and other reasons substantiate the assumption that the standard of living or comfort is made up mainly of wages, and is necessarily affected directly by alterations in wages when these take place apart from alterations in interest in a like direction or at the expense of interest.

In the examples treated above, no attempt was made to determine the relative probabilities of the effect which an increase in wages or interest might have upon the quantity of labour or capital. Change may result in any one of these alternatives; and as to the one to be occasioned, there will always be

considerable uncertainty. It may well be asked, however, if there is not a balance of probabilities pointing to some one as more probable than the other. So far as wages and labour are concerned this may be the case, since, owing to the elastic or responsive nature of the standard of comfort, a higher wage may become speedily as indispensable as the lower one preceding it, while at the same time the higher standard may occasion a rise in efficiency, and so actually create an increase in labour measured by its efficiency, which after all will supply demand just as readily as an actual increase in amount. This solution, however, does not present itself in the case of capital and interest, since between them there is on the one hand nothing corresponding in its action to the standard of comfort, and on the other no similar effect produced on efficiency of capital by alteration in interest. But more must be added. While the present standard of comfort alters, there varies with it the amount required for the future, and so the willingness of people to postpone more in quantity assists a change, further emphasised by the fact that owing to higher wages they possess more to postpone. These results, however, like these previously mentioned, cannot be attributed to increases in interest.

Account being taken of these, in addition to what was previously said, certain conclusions may be stated.

In the first place, there will always be great uncertainty as to the effect of an alteration in what is received on the effort to which it stands related in the case of both labour and capital.

In the second place, this uncertainty is diminished

in the case of labour and wages because of: firstly, the fact that wages are the aim of labour; secondly, the variability of the standard; and thirdly, the counter-effect of the standard on efficiency.

In the third place, the uncertainty remains entirely unrelieved in the case of capital and interest, because: firstly, interest is not the sole aim in postponement; secondly, irrespective of interest, saving is a result of several distinct classes of motive; thirdly, there is no variable standard; and fourthly, efficiency is not affected by changes in interest.

In the fourth place, changes of wages mainly govern the present standard, which itself is a chief element in determining the readiness to postpone or save.

## CHAPTER III

### FEATURES IN A THEORY OF DISTRIBUTION

THE conclusions arrived at in the last chapter are of very real importance in a survey of the attempts to outline an intelligible and consistent theory of distribution.

So far as the first suggestions considered are concerned, it may be said that if the incorrectness of any precise analogy between a theory of distribution and a theory of exchange had not already been demonstrated, the differences enumerated in the foregoing pages would have amply proved it. They are of equal gravity when applied to the second theory, that is, to the theory which assumed that owing to like causal relationships holding between interest and capital on the one hand and wages and labour on the other, the division of the net income between holders of capital and holders of labour is automatically regulated. The argument may be briefly recapitulated. It was suggested that rise in interest would call forth changes in the amount of capital, and a rise in wages like changes in the amount of labour, till equilibrium would be once more established. It is possible now to examine this theory with something like definiteness. In the first place, it is clear that the theory,

even granting its truth so far as it goes, is defective inasmuch as it suggests no determination of the initial point of equilibrium. It may be true that change brings about change, and so rectification; but what, it must be asked, has determined the initial division into a certain rate of wages and a certain rate of interest? Deviations from this division may be rectified in a particular way, but this tells us nothing as to the manner in which the division itself is usually arrived at. Any determination of this relationship possessing an element of permanence rests on the assumption either of a common force capable of embodying itself now in one and now in another of these forms, or of some element common to the two which furnishes a means of measuring one in the terms of the other. The former has been examined and put on one side. The latter appears to be equally untenable. Energy and wealth, and labour and capital are different things, without any intelligible and effective measure. In the second place, the connections respectively between wages and labour, and interest and capital are not analogous. The differences in this respect have been fully shown. Interest is not like wages, the one aim of its correlative. The position of the standard of living, both as a result and in its effect on wages, is unique. Lastly, the influence of alterations in wages on willingness to postpone, and so on the future supply of capital, cannot be ignored. If the action of wages were, as suggested, to equalise the supply of labour with capital, their increase would augment the quantity of labour, while at the same time there should be a decrease in interest, and certainly no increase in the supply of capital. But, as a matter

of fact, the increase of wages tends in the direction of an increased supply of capital, and in place of leading to a corresponding rise in interest, conduces to its fall. With such facts as these before us, it is not too much to say that this theory, like the preceding one, is lacking both in basis of fact and scientific precision.

The difficulties in the way of a solution on lines such as the above have been indicated as far as the difference between the respective effects of alterations in interest on capital and of wages on labour are concerned, though certain of these require further discussion. But there is one other difficulty needing mention, which is rather a ground of obscurity than a necessary obstacle to a rational theory whether based on lines as above or on others. Both capital and labour must be viewed in two aspects, that is, both as means to or conditions of obtaining an income and as factors in production. So far as those who save are concerned, it may be true that in many cases they may equally attain their future income either by a high rate of interest and a less amount of accumulation, or by a low rate and a larger accumulation. But the effect on production is very different. In the one case there is a small amount of capital, in the other case a larger amount. As a result, the total productive power of the country is seriously affected, and the demand or competition for the concurrent services of labour is of varying keenness. The particular instance of the need of a certain minimum rate of interest to prevent the gradual consumption of the total sum itself differs, of course, from the above. A like result holds good in the case of wages, in which case a rise, followed by a diminution in the

work, leads to less keen demand for capital. A distinction must be drawn between the forces involved in the demand and supply of capital and labour, because these result in interest and wages, and the forces in production which need each other and which are seriously affected by changes in the amounts in which they respectively exist.

It is now necessary to turn to the consideration of the possibility of some consistent theory of division as between capital and labour outside those which have been already discussed. In any theory the differences mentioned above will obviously play an important part, and none more so than that relating to the action of the standard of living or comfort. But before turning to that, it will be well to say a few words as to the nature of any theory which can be found to account for the facts as they have revealed themselves. One hypothesis must be abandoned. Capital and labour cannot be treated either as capable of interchange in response to the incentive of greater attraction, or as developing on similar lines in their connection respectively with interest and wages. As a consequence, a solution must either be arbitrary or based on the general idea that one of the two participators has a priority of claim owing to a greater power in pressing its demand, while the other has less power in so asserting its claims, and is rather dependent on what remains for its satisfaction. This latter view is subject to many modifications.

The first matter, however, to consider in connection with the possibility of any theory, relates to the peculiar position and influence of a standard of

comfort or living. The standard of living is that complex aggregate of satisfactions, necessary and customary, which habit makes man expect, and which he will demand with considerable insistence. It varies from class to class, and is seldom if ever more than a rough approximation to an amount, deviations from which encounter increased resistance according to their extent. It does not indeed follow that it cannot be reduced; only that reduction will mean a definite alteration in the scale according to which life is led. Against this the struggle is keen. In the same way it can be increased, but increased receipts do not necessarily imply an increase. A rise in the standard only occurs when wage has once more consolidated itself on a higher scale. Thus the standard of comfort expresses and determines the amount of satisfaction required in return for all the effort undertaken in production; that amount increasing with a rise in the standard and decreasing with a fall. It forms, so to speak, the unit of satisfaction. Certain circumstances must be noticed with regard to it. Alterations in the standard depend very much on two factors—changes in desire on the one hand, and changes in the means of satisfying them on the other. But desire or rather desires as a rule far exceed their means of satisfaction, and hence a rise in the standard tends to accompany an increase in income, when this occurs gradually and in an advanced community with highly developed and varied tastes. On the other hand, the same circumstances tend to explain the natural, if only passive, resistance which stands in the way of a reduction. Deprivation of what a man is accustomed to causes suffering greater

than the pleasure which accrues from an increase in satisfaction of like dimensions. Again, the relation of the standard to efficiency or productiveness of labour must be taken into account. Here a new set of circumstances is introduced. Of course, at any given moment and under any given conditions the satisfaction of the then standard is necessary to evoke labour of the kind and consequence required. But to go further, the actual rise in standard tends in many cases to increase the actual efficiency of labour. That this is necessarily or universally true cannot be contended, but within certain limits, and these limits are far wider than might appear at first sight, some such effect as this appears to be produced. It may be produced directly and immediately, as where the rise in standard provides the necessaries requisite to or the comforts largely associated with either more strenuous or better-applied labour. On the other hand, the consequence may manifest itself in a more indirect fashion on efficiency either by greater leisure for thought, or by improved opportunities for education or the acquisition of skill. In these ways, and as has been said they are not few, improvements in the standard of living may be the cause of greater efficiency and greater intelligence in production. It must be noted, however, in the above discussion, that the results indicated are not invariable. In the first place, every rise in wages is not followed by an improvement in the standard; nor, in the second place, does every such improvement occasion greater efficiency.

What analogy, it may be asked, to the above is presented by the conditions governing the postpone-

ment of consumption, and so the accumulation of wealth and the provision of capital? Should these be called a standard, it must be pointed out that such a standard differs in almost every respect from that sketched above. Firstly, this so-called standard, according to which postponement takes place, is essentially a comparison of things in the present as against things in the future, governed by well-defined and, so to speak, external considerations. The amount required, in the first place, depends in large measure on an estimate of wants, and these are considerations which cannot be affected by a rise or fall in the amount of interest. Equally removed from such influences is the anxiety which determines the extent to which the future is realised. A closer parallel occurs in the influence of a minimum rate if it can be assumed that such results in a method of saving which involves more capital. Even if true, this is of limited application. The conditions on which provision for future needs rests are governed, in the main, by external considerations and by the actual standard of living in the present. Secondly, such a term as standard is differently employed in this case from the use it received in the former instance. There it marked an initial relation between the unit of work and the unit of satisfaction; here it denotes a comparison of satisfactions like in kind but differing in time, and determined by definite considerations. Alterations in the means of meeting it have a restricted, if any, influence on its rise or fall. Thirdly and lastly, the differences thus observed find a counterpart in the inability of any change which may occur in the provision for the future, or in the rate of

interest to alter the productivity of a given quantity of capital.

A contrast such as that drawn above between the standard of living and the so-called standard of postponement is not surprising, if we remember that in one case we are dealing with a sensitive force whose standard lies along no lines of comparison with anything else and is determined by usage alone; with a force, moreover, so sensitive that alterations in standard may not improbably occasion an entire change in its efficiency. In the other case we have to do with a comparison based on external considerations, capable of description if not of measurement.

It is true that in the account given of the former, certain assumptions have been made which must be taken into account; but putting these on one side for the present, it will be well to sum up the conclusions arrived at in the event of their accuracy.

On the one side there is the fact that change in the immediate income may be absorbed or accompanied by changes in the standard demanded for life, and further by changes in the actual efficiency of the work, and so to some extent in its amount. Alterations, that is, embody themselves in corresponding changes in what is demanded as a condition of the time and exertion involved in work, and further it may be in the effectiveness of this work. This absorption or embodiment requires emphasis. On the other hand, changes in the future income can produce no such effects, and are accompanied by no such changes. Absorption indeed, as has been pointed out before, takes place, but without any necessary result in either altered demand or

efficiency. Interest alters, but the alteration does not seem to have any direct and any certain effect on the amount of postponement. In some instances the consequences are in one direction, in others in another. It is received passively and has no active results. Changes do not accentuate or weaken the demand. Changes in the amount demanded are not occasioned. Thus in the case of the standard of living and the payments which go to maintain it, there is a facility of increase and a reluctance in respect of abatement which have no existence in the case of provision for the future. If this latter rise, it rises, as a rule, because changes have taken place either in the present standard or in circumstances attending the future and affecting its estimate.

The relation of this conclusion to a theory of distribution requires attention.

Initially it would seem to indicate a greater power on the part of those receiving wages to demand and to retain any increase in such wages. With the increase certain changes take place which prevent any decrease in utility attending the new increment. The scale of requirement is shifted upward. Not only so, but satisfaction to the same extent as before, but on a new and higher scale, tends in many cases to justify itself, as it were, in greater efficiency. On the other hand, changes in interest which occur independently of and out of proportion to changes in the present standard, or other external circumstances, are not accompanied by any such concurrent effects on the scale according to which demand is made or on efficiency. If we suppose the increment in general income to be allotted to one or the other at first by chance; in the case of labour there

will be a new power generated to retain what is thus obtained, whereas in the case of capital the only power will be that of possession.

But any such solution as this depends, as has been pointed out, on the correctness of certain assumptions, and these require attention before any more formal statement is attempted.

The doubt may be expressed whether the rate of interest duly determined by the interaction of the supply and demand of capital does not constitute in some sense a standard of expectation. As against this it has been assumed throughout, though but tacitly, that the standard of comfort or living has no counterpart in the case of capital. In support of this view it may be pointed out that, strictly speaking, the actual rate either of wages or interest is entirely distinct from the standard which may follow on it and alternately enter into close correspondence with it. The fact that a certain rate is paid, given existing circumstances, under which of course its own existence and the possibility of its attainment are included, means nothing more than that people will not put up with less as long as it can be had. They might be willing to accept more. But a standard is something more substantial than this. It implies a custom so fixed that it governs the desires and conditions the expectations. In the case of wages such a standard tends to come into existence, rising slowly to fill the vacuum left by the advance of wages, till practical coincidence occurs, and a material backing is afforded which makes any reduction difficult. Such a phenomenon does not present itself in the case of interest. Interest rises and falls, but its movements are unaccompanied by

any standard which can support advance and resist reduction.

Another assumption needing notice relates to the view that in the competition for the division of the product the two forces of labour and capital are on equal terms. As has been shown, labour may possibly be regarded as standing in a more intimate and closely-knit connection to wages than occurs in the case of capital and interest, or, in other words, labour, the standard of living, and wages are treated as so connected that alterations in one occasion alterations in the other, and so forth. A rise in wages when it brings with it a rise in the standard is more likely to be retained than when no such effect is produced, because the labour formerly conditioned by lower wages, now requires one which is higher. Those rendering labour will demand, and demand more effectually, the larger amount that can accrue owing to increased productivity, thus possessing an advantage over those who own capital. It would not be correct, indeed, to say that a change in interest is without effect; but this much seems true, namely, that interest is less essentially a condition attending capital than are wages in the case of labour. Any superiority in competition of this kind depends, however, on the assumption that they are at least equally placed in other respects, and it is this which is now called in question. It may be true that wages are more closely allied with a certain amount of labour than is interest with a certain amount of capital. It is at least equally true that wages are essential to labour in a way quite different from that which exists in the case of interest and capital. Labour is bound up with

life, and so depends on a regular and continuous supply of wages and maintenance in a manner quite unknown in the equivalent case of capital.

The latter, however, has waiting powers and the former has not. It is not a question of less or more labour as it might be of less or more capital, but of labour or no labour at all, and so in the crises of competition labour has a vital weakness which may force it to surrender. On the extent to which this deficiency has been made good by organisation and other means much could be said, but this is not the place to say it. On that depends the correctness of the assumption now under consideration : if by these or any means the inherent weakness of labour is counteracted, it would seem that the terms on which the industrial fight is conducted are even, and that labour will be free to evince that greater power of demanding or retaining wages which it possesses by reason of the peculiar position and action of the standard of living.

The next point is the effect produced upon the standard of living by alterations in wages. In what has been said it has been assumed that changes in the standard are not only possible but frequent, especially when a rise in wages takes place gradually and continuously, and it may be well argued that this is borne out by the experience of last century. Like results cannot be anticipated from alterations in wages of a more fitful and violent nature. On the other hand, it must be remembered that the reverse view to this was taken for granted at one time. It was then believed that a rise in the rate of wages was temporary, either from causes in itself, or, so far as individuals

were concerned, from the effect it produced on the number of the population. The two assumptions are at once in curious contrast and yet remarkable relation.

The earlier assumed a direct connection between alterations in wages and alterations in the actual quantity of labour, and the later a connection between like changes in wages and the standard equating labour and reward; but in both instances it was taken for granted that changes in wages did produce some effect. In another chapter it has been argued that there is no regular relationship of this kind visible in the case of interest and capital.

The last matter relates to the probable increase in efficiency due to a rise in the standard. Put briefly, it has been suggested that this may ensure a rise in quality rather than quantity of labour. To arrive at any definite decision on this point would be very difficult. At present it is certain that materials have not been collected which would warrant anything more than very tentative conclusions. On the one hand, it is clear that within certain limits, when wages are rising at a comparatively small distance from a real standard of necessary or semi-necessary comfort, the result holds good and efficiency does increase. On the other hand, like consequences seem improbable at the other end of the scale. But here again there is a marked contrast between the relation of wages with labour and that of interest with capital.

Given rises in wage, it would appear then that one of four things must occur. Either there may be an increase in population with increased quantity of labour competing to enter into the yoke of production with capital, and consequently a fall in the rate, so far

as the individual is concerned, back to the old level; or people may be tempted to work longer, in which case the time wage will probably fall; or there may take place a rise in the standard with or without an increase in efficiency. If in addition to the rise in the standard, efficiency improves, both a demand for new labour and the maintenance of the rate may be attained at one and the same time, since a rise in effectiveness can effect the one without depressing the other. But if the rise in standard be unaccompanied by any such change, the demand for more labour, should such be embodied in the increased wage, will remain unsatisfied. So far as the supply of labour is concerned, an increase of some sort occurs in the first of the four possible cases. So far as a high rate of wage is concerned, that will tend to be secured only in the last two instances, though in the second case the total individual wage as distinct from the actual time wage will not fall back to its former level.

It is, however, when we turn to interest and capital, and the corresponding effects produced in their case, that the real significance of what is said above becomes apparent. Greater opportunities of gain, though they may in certain instances stimulate accumulation and so issue in the provision of a larger supply of capital, will not of themselves effect an alteration in the scale of comparison between the present and the future. That depends, at any rate in the main, on considerations outside their control. Again, under no circumstances can they increase the efficiency of capital and so augment its effect without disturbing its amount.

A comparison shows the far greater closeness of

the relationship between wages and labour than of that between interest and capital. Putting aside the particular influence attached to the operation of the standards of living and postponement in their respective cases, the effect of alterations in both wages and interest are placed naturally enough in doubt. The corresponding changes might be sometimes in one, sometimes in the other direction, though even here it would seem probable that wages would exert a more controlling and uniform influence than interest, on account of the greater variety of the aims leading to saving and their more discordant character. But when the standards governing in both cases come into consideration together with other circumstances this difference is very deeply marked. In the first place, alterations in interest do not lead to a shifting of the standard, whereas alterations in wages often do; in the second place, the amount required in the future is determined by a series of calculations in which the actual standard or custom of the present plays a conspicuous part; while lastly, the efficiency of capital unlike the efficiency of labour remains unaffected by alterations in reward. It would follow as a matter of course that in the competition for the distribution of the net income labour would enjoy usually a distinct advantage, if only it could be assumed that the two competitors are on equal terms. This has been dealt with already; under present conditions the assumption would seem to be more justifiable than formerly.

Two conclusions from the above argument stand forth prominently. In competition with capital the claims of labour for wages being based on a standard determined by usage and so difficult to change, and

under some conditions on the close connection between efficiency and the wages themselves, have greater force. Capital receives what falls to its lot and absorbs it. In its case variations make comparatively little difference. Again, and in close connection with the foregoing is the position occupied by labour, as the active recipient. Capital shares more passively. Put thus the claims of labour, to employ a somewhat hackneyed and misused expression, have a vitality and a priority to which capital cannot pretend. Yet the very passiveness of capital is, so to speak, its safeguard. Let us grant that its claims have little force, that save in the case, if any, where a minimum is required little change in amount would ensue upon an alteration in interest, even that interest could encounter reduction without any evil effects in production; still, under our present system of organisation the rate of interest offered will not fall, since it is fixed at that which is necessary to distribute capital among those who can use it to the best advantage, the current rate of wages being assumed. Nor is there any reason why this rate should correspond with that *necessary*, if such there be, to procure and keep constant the given amount of capital in use.

The contrast between the events ensuing if a rise in wages and a rise in interest is striking. Following on the former comes a gradual rise in the standard of living, till the void between the wages received, owing to the immediate exigencies of the quantitative relations of capital and labour, and that demanded is filled up. The same amount of work is performed and the same completeness of satisfaction attained, though owing to a shifting of the standard the scale according to which effort and satisfaction are measured has risen. But for

this a less amount of labour would be forthcoming. On the other hand, the rise in interest is not followed by any like movement. A considerable distance exists between the interest offered and that which may be supposed to be demanded. Under these circumstances a gradual decrease in capital might seem probable. Of course habit and the dislike to diminish a stock might operate in its delay, but with the gradual reproduction of capital and the need of repairing wastage if the quantity is to be maintained, reduction would be probable unless stayed in some manner. It has been previously suggested that such circumstances will be met by redistribution of the saving taking place among the various classes engaged in postponement. As their aims are diverse, the same circumstance may affect them in different if not opposing ways. With a rise of interest some may increase others decrease their postponement. The rise in interest has been met not as in the case of wages by an adaptation of the standard of living and comparison between effort and reward, but by a redistribution of the work of postponement. The grasp of capital upon a particular rate of interest is far less tenacious than that of work upon its wages or reward. This is best seen if we turn to the reverse case of a fall in the product or total income, and so a necessary fall in one or other or both of the factors sharing it among them. If wages are threatened, the standard of living to which those who are threatened are habituated affords a basis of resistance. Reduction is resisted even though it may have to be submitted to, and the menace of such resistance lies of course in the unwillingness to work on worse terms than those previously received. But is there anything like this if

a reduction of interest tends to occur? According to the theory laid down as probable though not as invariable, reduction, when it takes place, may weaken the power of effective resistance by evoking new supplies of capital.

If this be so, the claim of those who receive direct rewards, as wages or salaries, is obviously superior so far to the claim of those in receipt of interest, and would uniformly prove more effective but for the particular circumstances attending interest, whereby the rate actually offered and paid may continue in excess of that required, owing to alterations in the classes engaged in saving or postponement. As things are, it will be effective just in as far as it be necessary and thus a kind of first charge, so reducing the amount that can be offered for the use of capital, and as the rate of interest offered coincides with the lowest rate essential at present to the accumulation of the given amount of capital.

Even if interest be unnecessary for saving, none the less some rate must be paid to secure the distribution of the limited supply of capital among those best able to use it.

THE END



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